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Economic Report of the Governor

1991

Submitted by

Pete Wilson
Governor
State of California

to the

California Legislature
1991-92 Regular Session

State of California
GOVERNOR'S OFFICE
SACRAMENTO, CA 95814

PETE WILSON
GOVERNOR

TELEPHONE
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May 14, 1991

Dear Senators and Assemblymembers:

California is in crisis. Like most other states, we face an unprecedented fiscal crisis because of a national recession. But our troubles are also uniquely our own. It is time for California to lead the way out of recession by confronting issues we have been afraid to address for decades.

Simply put: We need to rethink the way we govern California. We need sweeping reform.

As you know, the recession has compounded the basic structural flaw in California government. That is why we face a budget shortfall of nearly $13 billion. When I introduced my Budget last January, it was estimated that the shortfall would be about $7 billion. Since then the gap has virtually doubled because demand for state services has far outpaced revenues. The demands on us to provide critical services in education, health, welfare and environmental protection has never been greater. The disparity between the needs of our state and the means to pay for them has never been more disappointing.

Beyond the structural problem, the economic situation is more critical than usual. The forecast underlying the estimated January Budget gap assumes a recession of short duration with recovery underway later this year. Unfortunately, it looks as if the recovery will be delayed. There is no quick fix. **California state government needs real solutions to survive.**

The path we choose today is critical to our future. If we choose to govern by crisis management -- if we opt to spend the fool's gold of excessive taxation -- then California will decline -- as a society -- as a place to live -- as a golden state with a great future.

I cannot do this alone. I need, and our state needs, your leadership. California was discovered by pathfinders. If we work together, we can cut a new path for our children -- a future worthy of a Golden State.

Sincerely,

Pete Wilson

PETE WILSON

STATE OF CALIFORNIA PETE WILSON, Governor

DEPARTMENT OF FINANCE
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May 9, 1991

The Honorable Pete Wilson
Governor
State of California
State Capitol
Sacramento, California 95814

Dear Governor Wilson:

It is my pleasure to submit to you an economic report for 1991 on the State of California.

As you are well aware, these are not the best of times for California's economy. In fact, it is the first time in the nearly eight years that the state's economic expansion has taken a downturn. For most of last year, California's economy continued to out-pace the nation, but toward the end of 1990 the state's margin of growth over the rest of the nation began to narrow. Clearly, the recession that has already affected most other states is at the heart of this slowdown.

The good news is that recent recessions have been relatively short in nature. In fact, most economists expect an upturn in the economy to begin later this year. The bad news is that even in healthy economic times, California is suffering from ballooning program costs that simply exceed the revenues the state collects. We cannot continue to sweep these structural problems under the rug. Unless we streamline and reduce the growth of government programs, we will be in a similar fiscal crisis in the near future.

I would like to take this opportunity to thank the staff of the Department of Finance for their time, expertise and dedication to the production of this report.

Sincerely,

Thomas W. Hayes

THOMAS W. HAYES
Director

Attachment

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The information in this Report was current as of April 1, 1991. In a few cases, such as first quarter gross national product, it has been possible to include data available through late April, 1991.

I. INTRODUCTION

After a run of nearly eight years, America's longest peacetime economic expansion finally ended last year. Most economic indicators began to turn down in July, even before Iraq's invasion of Kuwait. Whether or not a full recession would have developed without the Persian Gulf war is a question that will never be answered. Clearly however, the invasion and subsequent war contributed to the economic downturn.

Accounting for over 13 percent of the nation's economic activity, California has felt the impact of the national downturn. For most of last year, the state's economy continued to outperform the nation as it had during the entire 1980s expansion. On an annual basis, for example, non-agricultural employment in California increased by 2.4 percent last year, half a percentage point more than the U.S. gain of 1.8 percent. Similarly, personal income rose an estimated 7.5 percent in the state, well above the nation's 5.9 percent advance.

Toward the end of 1990, however, the state's margin of growth over the rest of the nation began to narrow. Employment data for December 1990 show identical year to year gains of 0.7 percent for the state and nation, although preliminary figures show some improvement in the California data in early 1991. The narrowing of California's "growth spread" can be traced to several factors.

Prominent among these was a sudden drop in homebuilding activity which began in the spring of last year. Unlike much of the nation, which had been in a housing slump for over three years, homebuilding in California remained strong through the early months of last year. As recently as March, 1990 housing permit authorizations in California were running at an annual rate of over 200,000 units. By year-end, however, the pace had been cut by more than half to less than a 100,000 unit rate. Essentially, California telescoped into a few months the housing downturn which nationally had been underway for over three years.

One result was that construction employment dropped nearly 10 percent between December 1989 and December 1990, almost twice the national rate of decline. In addition, a number of construction-related manufacturing industries, including stone-clay-glass, lumber and furniture are feeling the effects of the housing downturn.

Another element in California relates to the continued weakness in aerospace manufacturing. Defense procurement outlays have been declining for several years, but on an overall basis, this had been offset by rising space and commercial aircraft activity. Recently, however, several firms in both the military and commercial segments of the industry have taken steps to cut overhead costs, resulting in steep declines in both aircraft and missile-spacecraft employment.

Of course, California shared with the rest of the nation many of the war related effects which contributed to the downturn: weak retail sales, a disruption of both business and pleasure travel and a further erosion in already weakened housing markets.

Yet even in recession, the diversity of California's economy continues to serve it well. With defense procurement outlays continuing to decline in 1990, manufacturing again held up better in California than in the nation as a whole. Strength in export sensitive industries such as computers, apparel and food processing offset much of the weakness in aircraft, missiles and navigation instruments. In the service sector, the business services group, including computer software and systems, continues to grow rapidly, as does the engineering and management consulting group.

Another source of economic strength is California's remarkable population growth. The 1990 Census confirmed that the state accounted for over one-quarter of the nation's population growth in the past decade, increasing more than 6 million to 29,760,021 as of April 1, 1990. By the beginning of this year, the state's population reached 30.3 million.

Focus on Recovery. Fortunately, recessions are, by nature, relatively short-lived, averaging less than a year in duration. The current episode, having started last summer, will probably be over by the middle of this year. Indeed, there are already a number of factors in place which should bring about an upturn in activity by the beginning of summer:

- The end of the Persian Gulf war and the accompanying rise in consumer confidence.
- The easing in Federal Reserve monetary policy, as evidenced by declining interest rates and a resumption of growth in the nation's money supply.
- The generally well balanced inventory situation, which means that an upturn in sales will quickly translate into increased production and employment.

For a number of reasons, the recovery may lack some of the spark and vigor which is normally expected in the early stages of an upturn:

- High debt burdens and problems throughout the financial system may impede the pace of recovery, especially in construction.
- With foreign economies weakening and the U.S. dollar getting stronger, foreign trade will provide only marginal support to the upturn.
- Budget pressures at the Federal, state and local levels will severely limit the growth of government spending.

The following is a summary of the major points on the California economy covered in subsequent chapters of this Report:

California Outlook. In most respects, California will reflect the national experience, with an upturn underway by spring or early summer. Like the nation, California's recovery may also be initially subdued, since most of the elements affecting the U.S. economy also influence California. The pattern of activity this year will be a mirror image of 1990: sluggish to moderately declining activity in the first half, with a gradual pickup later in 1991.

Next year should see a return to more normal rates of growth, although like the nation, the first full year of recovery may be less robust than past experience might suggest. Nonetheless, California should outperform the nation by a solid margin in 1992.

Drought and Freeze. March rain and snowfall have eased the state's water situation considerably, but the drought will still affect farm output and costs, while requiring continuing conservation in most urban areas. The drought, coupled with the December freeze, will probably reduce farm incomes by about $1 billion or 6 percent in 1991. Cotton and rice will be the major crops affected. The state will continue to produce over half the nation's fresh fruits and vegetables. In some areas, water oriented recreation may be affected and home construction may also be curtailed in scattered parts of the state. Again reflecting the diversity of the state's economy, these weather related factors will probably reduce income growth by less than 1/2 percent this year.

Manufacturing. California's manufacturing sector has experienced considerable success and growth in recent years. Between 1980 and 1990, California's share of U.S. manufacturing employment increased by nearly 1-1/2 percentage points and even in the recession, factory jobs have held up better than in the rest of the nation.

The state's favorable industry mix, with emphasis on faster growing high technology industries, helps explain California's manufacturing success. In addition, however, the Census of Manufactures reveals that California's workforce is generally more productive than the national average. Value added (essentially the value of shipments less the cost of materials) per worker in 1987 was 13 percent above the U.S. figure, while wages averaged only 1 percent more than average. California's output to cost advantage is evident in virtually all export industries.

Construction and Real Estate. Concerns that California may be the next major problem area in real estate are considerably overdone. For one thing, given the state's economic diversity, population and labor force growth, there is little comparison between California commercial markets and those in the Southwest and New England. Commercial office vacancy rates are generally lower in California than the national average, while population and labor force growth continue to outpace the nation. Like most of the country, California faces a commercial construction slump, but office markets in the state should regain balance long before those in many other areas.

Neither is there evidence of widespread imbalances in the state's housing markets. Home prices in coastal areas are high, but this reflects competing land use pressures, rather than a speculative bubble. Housing vacancy rates in these coastal areas are among the lowest in the nation. California's low homeownership rate suggests that there may be a substantial queue of potential homebuyers among the renter population.

II. NATIONAL OVERVIEW

Although real GNP continued to grow through the third quarter of 1990, most monthly indicators of economic activity began to turn down in July. The current downturn followed an extended economic "slowdown", defined as a sustained period of below potential economic growth, which has been dated from early 1989.

Considering labor force growth and long term productivity gains, potential GNP growth is generally defined in the 2 to 2-1/2 percent range. From early 1989 to mid-1990, growth averaged well under 2 percent. The slowdown was associated with declines in homebuilding activity, weak retail sales gains, and in its final stages, declines in after tax real incomes.

No two business cycles are exactly alike, and the current downturn has a number of unusual features which may well influence the behavior and timing of the recovery. Among these are:

- The lack of a major buildup of inventories requiring corrective cutbacks in output in the later stages of the recession.
- Narrowing of the foreign trade deficit cushioned the effects of declining domestic demand on overall economic activity.
- A relatively low rate of inflation, and more important, the lack of any sustained long-term deterioration in price performance.
- Declining homebuilding activity for three years prior to the recession, in an environment of stable or declining interest rates.
- A greater than usual degree of financial distress.

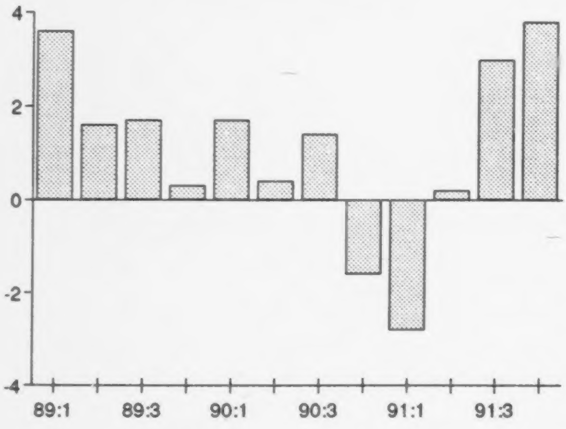
There are also several very familiar features in the current downturn:

- Over-investment, this time not in inventories, factories or oil wells, but in hotels and commercial office buildings.
- Federal Reserve monetary policy which was tight for two years prior to the recession, and remained restrictive for several months after the downturn began.
- A "credit crunch" reflecting more cautious lending standards and new bank and savings capital requirements which have prompted many institutions to reduce lending activity.
- Other normal symptoms of recession are present: rising unemployment, declining employment, falling real disposable incomes, declining retail sales and factory orders, and a general drop in business and consumer confidence.

Review Of 1990

Real GNP. Overall, real gross national product grew by 1 percent on an annual average basis in 1990, and only 0.3 percent on a fourth quarter to fourth quarter comparison. As the chart indicates, quarterly GNP growth had been weak since early 1989, before slipping

Quarterly Growth in Real GNP
(Annual rate of change)



into negative territory during the final months of last year.

On an annual basis, consumer spending increased only half as much as in 1989. Durable goods outlays were unchanged, while nondurables actually declined by nearly a percent. Services spending, normally less sensitive to the business cycle, continued to rise.

Fixed investment outlays declined edged down, after rising moderately in 1989. Housing investment decreased for the third year in a row. Nonresidential building was down slightly, and business equipment outlays rose but by less than half the 1989 increase. Inventories declined by $1 billion, after increasing $24 billion in 1989, a reduction of $25 billion in terms of the effect on GNP growth.

Net exports increased by about the same amount as in 1989. Government spending rose slightly more last year than in 1989.

Looking at fourth quarter results alone, the cushioning effects of exports and military spending are quite evident. With virtually all categories of consumption and investment declining during the period, net exports increased $38 billion from the third quarter--much of the improvement reflected lower petroleum imports. The $7.5 billion increase in defense spending accounted for the lion's share of the government sector's $9.6 billion increase from the previous period.

Table II-1
Inflation Trends, 1989 to 1991
(Percent change)

	1989	*1990*	*Forecast 1991*
GNP Deflator	4.1	4.0	3.7
Personal consumption expenditures	4.6	5.0	4.1
Business fixed investment	1.0	0.5	-0.2
Residential investment	3.5	1.6	0.7
Government puchases	4.2	4.1	4.1
State and local purchases	5.0	4.6	4.6
Consumer Price Indices:			
United States	4.8	5.4	4.9
California	5.0	5.5	4.7
San Francisco	4.9	4.5	4.9
Los Angeles	5.1	5.9	4.5

Source: U.S. Department of Commerce
U.S. Department of Labor
California Department of Industrial Relations
California Department of Finance (Forecast)

Inflation. The broad measures of inflation in the national income accounts continued to show moderate increases in 1990. The fixed weight deflator, which takes account of price movements using the 1982 mix of goods and services in the economy, increased 4.5 percent last year, the same as in 1989 and up only slightly from 1988's 4.2 percent increase. The implicit deflator, which takes account of both price movements and the mix of goods and services produced, rose 4.1 percent in both 1989 and 1990.

In the fixed weight deflator, nondurable goods--mainly reflecting food and energy prices--rose 6.8 percent last year. All other major categories increased less than 5 percent. Services consumption prices rose 4.7 percent, slightly less than in the previous year. Business investment prices rose 3 percent, while homebuilding costs were up less than 2 percent last year.

The consumer price index increased 5.4 percent, little different from the 5.2 percent rise in the consumption portion of the fixed weight deflator. Last year's increase was slightly more than 1989's 4.8 percent rise. Virtually all of the difference was accounted for by energy prices, which increased 8.3 percent, up from 5.6 percent the previous year. Energy price movements reflect the situation in the Persian Gulf. Oil prices, touched $40 a barrel briefly last fall, before settling back to near pre-invasion levels of $21 in January.

Labor Market Developments. The downturn took a toll on the nation's labor markets last year. Nonagricultural wage and salary employment declined throughout the second half of the year, while the jobless rate rose nearly a full percentage point, from an average of 5.3 percent in the first six months of 1990 to 6.5 percent in February 1991. The rise in the jobless rate would have been greater had labor force growth at least kept pace with gains in the 16 and over population. The civilian labor force was virtually unchanged over the course of 1990, while the adult population grew an estimated 0.9 percent. Most of the drop in labor force participation was among teenagers.

Employment losses were concentrated in goods producing industries, mainly manufacturing and construction. Manufacturing has been declining steadily since early 1989, but the fall off picked up speed in the second half of 1990 as auto companies adjusted production schedules to weakening sales. Construction reached a peak in February 1990, but has now been on a declining trend for a full year.

In the latter months of 1990, private service producing industries also reflected the effects of the recession. Wholesale and retail trade and finance, insurance and real estate employment declined from August through December. Even the services industry showed an essentially flat trend during the closing months of 1990, with only health services exhibiting any measurable growth.

Government employment was distorted in the spring and early summer by the hiring of temporary Census workers. However, on a January 1990 to 1991 comparison, Federal employment was down slightly. Including continued modest gains in state and local jobs, total government employment advanced less than 1-1/2 percent over the past year.

Consumer Spending. The pattern of retail sales was also quite typical of an economic downturn, with total dollar volume in the nation up 3.9 percent in 1990, the smallest gain since the 3 percent rise in 1982. In January, 1991 retail sales actually fell below the year earlier level (by more than 2 percent) for the first time in 30 years, and remained below the 1990 level in February. Compared to previous recessionary periods, the current weakness is being magnified by the very low rate of inflation for most goods.

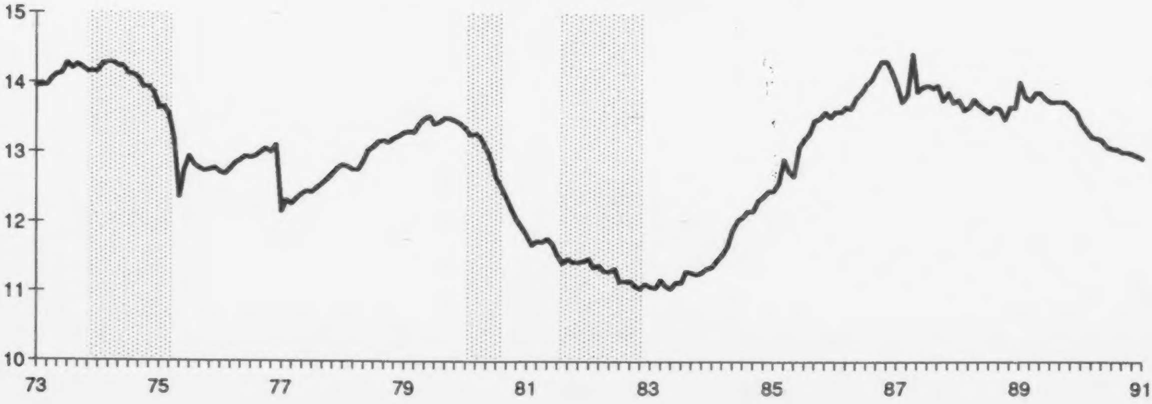
Until Iraq's invasion of Kuwait, sales could be best described as lackluster, reflecting weak real income growth and high levels of household debt. The unsettling events in the Middle East triggered a sharp decline in consumer confidence, which reached 10 year lows in January.

Sales of durable goods, including cars, furniture and building materials, declined during 1990. New car sales fell 4 percent to 9.5 million units, following a 7 percent drop in 1989. The weak 1990 sales figure would have been even weaker in the absence of substantial sales to daily rental fleets, the largest of which are either owned or controlled by the major U.S. automakers. Sales in the opening weeks of 1991 were down sharply from already poor early 1990 levels.

Department stores achieved Holiday season sales goals only through deep price discounting, despite the fact that most major stores had planned for a poor season and were not overstocked with inventory. In the recessionary environment, discounters generally fared better than full line, full price stores. Weakness in furniture, appliance and building materials sales reflected the continuing slump in housing.

Among nondurables, gasoline posted a double digit advance, reflecting Gulf-related price movements and higher taxes. After adjusting for these price movements, real gasoline volume fell 2 percent last year. Food sales rose almost 5 percent for the year, but were down slightly in real terms. Clothing purchases were unchanged when adjusted for inflation.

United States
Consumer Credit Excluding Revolving Credit
(Percent of disposable personal income)



Housing. In most parts of the nation, 1990 continued a four year trend of declining home construction and sales of both new and existing houses. Housing starts of just over 1.2 million were the lowest since 1982's 1.06 million unit volume. Although mortgage interest rates rose modestly during the first few months of the year, borrowing costs declined in the second half of 1990 with no effect on sales or construction volume.

Multi-family construction reached a 15 year low in 1990, reflecting elements of the 1986 Federal tax reform, which eliminated most incentives for residential rental investments, as well as the continuing decline in the young adult population, who are the most likely market for apartments. Despite the low level of multi-family construction, apartment vacancy rates in most areas of the nation showed little evidence of tighter rental markets.

Prospects for the housing industry, both nationally and in California, are discussed in more detail in Chapter VI of this Report.

Nonresidential Investment. Real business investment increased 1.5 percent in 1990, down from a 3.9 percent gain the previous year and a better than 8 percent jump in 1988. All of last year's increase was attributable to equipment purchases, which increased 2.4 percent. Structures were down 1 percent, following two years of no growth.

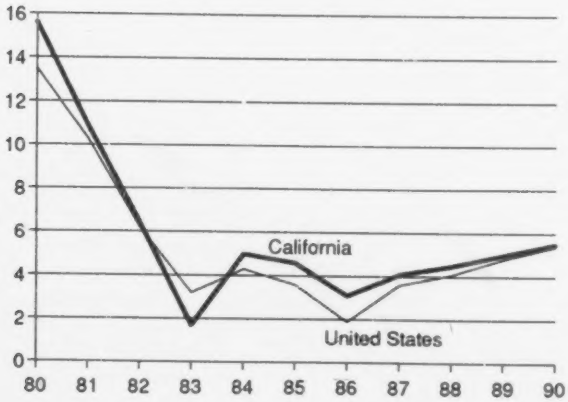
Even equipment outlays were considerably weaker in 1990: last year's gain was less than half 1989's 5.2 percent increase and only one-quarter as much as the better than 11 percent rise in 1988. Moreover, equipment purchases have been dominated in recent years by computers and other high technology goods, a segment for which the Commerce Department imputes very large price declines based on the enhanced computing power of each generation of new machines. Industry sources indicate that actual unit shipments of computers showed little growth in 1990.

Within the structures component, nonresidential buildings (commercial and industrial) fell 3 percent and utilities spending was off slightly. Mining and petroleum, on the other hand, posted a 7-1/2 percent increase last year. Weakness in the nonresidential buildings segment reflects high vacancy rates in office buildings and excess supply of hotels and, in some areas, retail space.

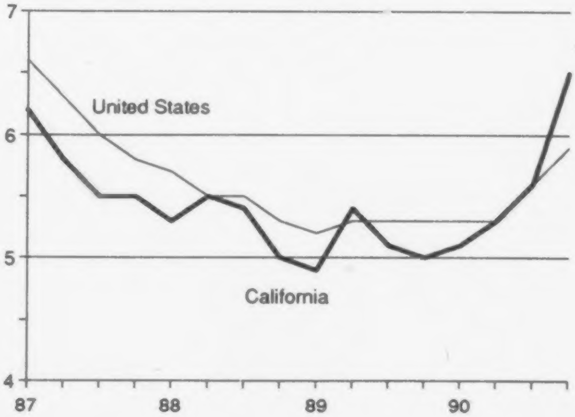
One negative number--business inventory investment--is actually a bright spot for the economy. Despite weak fourth quarter sales, businesses managed to reduce inventories by more than $16 billion in real terms during the final months of 1990. For the entire year, real inventories were down a little over $1 billion, after an accumulation of almost $24 billion in 1989.

The fourth quarter correction is good news because it suggests that firms took steps early in the recession to

Trends in Inflation
The Consumer Price Index
(Annual percent change)



Unemployment Rate
(Percent)



avoid an excessive buildup of inventory caused by weaker sales. This may help to explain the unusually sharp declines in manufacturing employment prior to and in the early months of the recession, and provides the hope at least that most of the manufacturing correction will be over in first half of 1991.

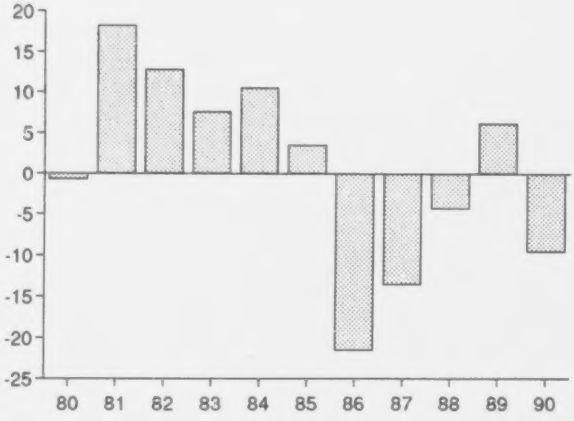
Foreign Trade and the Dollar. Another area which is helping to soften the current downturn is foreign trade. Not only is the weak dollar and enhanced U.S. manufacturing productivity helping to boost exports, but much of the inventory correction in such segments as consumer electronics, apparel, automobiles and petroleum will be absorbed by importers rather than domestic producers.

The dollar's foreign exchange value weakened throughout the year, especially in the second half. The recession in the U.S., with its implications for lower interest rates, coupled with higher interest rates in Japan and Germany, made dollar investments less attractive and thus helped reduce its value. German investments have been attracted by opportunities and needs in the newly reunited eastern portion of the country. Declining stock market and real estate values have inhibited Japanese participation in world capital markets. Finally, following Prime Minister Thatcher's resignation, the British government agreed in principle to join the European Monetary System (EMS) and has sought to align Sterling with the German mark, with a resultant 20 percent increase in the pound's value against the dollar.

On a purchasing power basis, the dollar is undervalued by 20 to 40 percent against these three key currencies, a situation which is not sustainable in the long run. In March of this year, exchange market trends turned more favorable for the dollar. Developing weakness in European economies, coupled with prospects of recovery in the U.S., resulted in a 5 to 10 percent uptick in the dollar's value against these currencies.

Government Purchases. Following consecutive years of 1-1/2 percent declines, real Federal defense purchases increased by 1 percent last year, mainly on the strength of a fourth quarter surge related to the Persian Gulf war. Although most of the commonly quoted cost estimates overstate actual purchases, the war is providing a small boost to the economy--about 0.2 percent of real GNP in the fourth quarter, and perhaps as much as 0.5 percent during the first quarter of 1991. The fourth quarter effect from the war was about the same as the Census effort in the April to June period of last year.

Trade Weighted Dollar
(Annual percent change)



Nondefense Federal purchases of goods and services (excluding social security and other transfer payments) rose nearly 8 percent, with half of the increase accounted for by slower redemptions of farm loans under the Commodity Credit Corporation (CCC) program. Commodity Credit holdings were reduced by $1.6 billion in real terms last year, but this was $3 billion less than the 1989 paydown. Under national income accounting rules, Commodity Credit loans are counted as government purchases when the loans are made, and "negative purchases" when they are repaid. Excluding CCC activities, real nondefense purchases rose $3 billion or 3.6 percent last year.

On a national income accounts basis, which basically includes the social security surplus but excludes most of the savings and loan "bailout" expense in the Resolution Trust Corporation (RTC), the Federal deficit widened to $161 billion in 1990 from $134 billion the previous year. Deficit estimates in the upper $200 to lower $300 billion range generally include RTC activities, which are mainly financial transfers (replacing liabilities of failed thrifts with U.S. Treasury debt) and do not affect national income or output.

Higher deficit estimates may, in addition, exclude the social security surplus, in order to isolate and highlight the "government operations" deficit. However, from an economic perspective, social security taxes and outlays, although excluded from government purchases in gross national product, are a major element in the personal income side of the accounts.

State and local purchases of goods and services (excluding welfare and other transfer payments) increased 2.9 percent in real terms during 1990, in line with growth during the previous two years. Many state and local governments are under budgetary pressure, with weak revenue growth (or outright declines in some parts of the East) associated with the recession. At the same time, rising school enrollments, reflecting the upturn in births since the mid-1970s, and escalating medical care costs are placing upward pressure on outlays.

To illustrate these budget pressures, the aggregate operating deficits of state and local governments reached $40 billion at an annual rate in last year's fourth quarter, compared to less than $1 billion at the end of the last recession in 1982. Against this background, it is obvious that neither Federal nor state and local governments are in any position to contribute to the economic upturn.

Financial Developments

The stock market, often viewed as a leading indicator of economic activity, reached a peak in 1990 at about the time the economy turned down. The Dow Jones Industrial Average topped out at 2999.75 on July 16th. The broader Standard and Poors and New York Stock Exchange indexes also peaked in July of last year.

The stock market declined through mid-October, reaching a low on the Dow of 2365, off about 17 percent from the peak. Following a mild rally through year end, the market looked as though it might test that low again in January. But to the surprise of most market analysts, the outbreak of war in Persian Gulf touched off a powerful rally in mid-January, which in the space of two months carried the Industrial average to within a few points of its pre-recession peak.

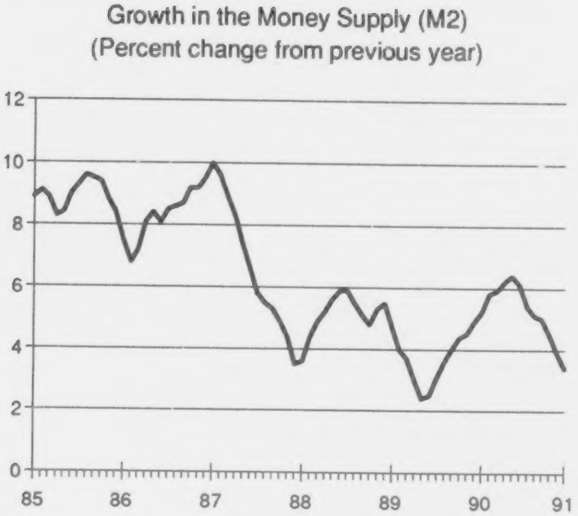
Monetary Policy: Easy or Tight? Until the beginning of 1991, there had been considerable debate over whether the Federal Reserve had been easing policy at all during the initial stages of the recession, even though Congressional testimony and policy minutes had for some months been couched in terms of "ease" and "accommodation". True, the Fed had, from September through December, encouraged a full percentage point decline in the Federal funds rate--deposits traded among banks, the cost of which is directly affected by the Federal Reserve's purchases and sales of Treasury securities which add and drain funds to and from the banking system.

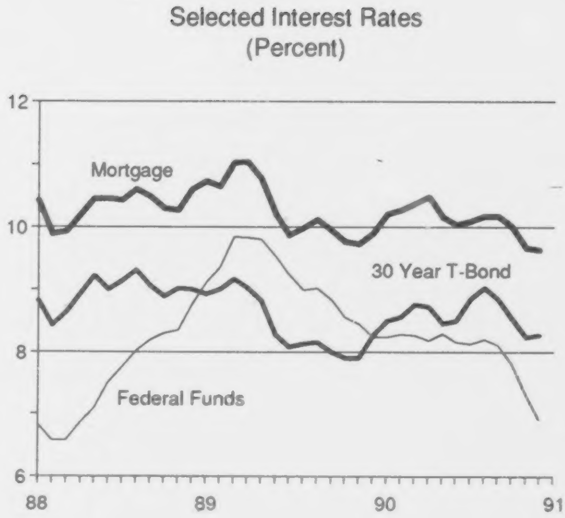
In addition, in December the Fed eliminated reserve requirements against business time and Euro deposits (dollar deposits in London branches of U.S. banks) and cut the discount rate--the rate at which the Federal Reserve lends directly to banks--by 1/2 percent. The drop in reserve requirements presumably frees funds for lending, or at the very least, makes lending more profitable by eliminating non-interest bearing deposits at the Fed. The discount rate cut is also considered a powerful policy signal.

The problem was that the Fed appeared to be following the market rather than leading it. The drop in the Federal funds rate was usually anticipated--often by several weeks--in the Treasury bill market. Moreover, even though bank interest rates declined, bank reserves--the raw material for money and credit--did not grow at all in 1990. The money supply, M2--consisting of currency, checking accounts and most savings deposits--grew less than 3 percent on a fourth quarter 1989 to 1990 comparison, the slowest annual increase in more than 30 years. Thus, it appeared that the decline in interest rates, far from being encouraged by the Fed, was simply a reflection of deteriorating market conditions.

Link to the Credit Crunch. Under normal circumstances, last year's policy moves should have added to bank reserves and encouraged faster money supply growth. But new bank capital requirements are to take effect by the end of next year, and much of the banking system is attempting to align its balance sheet with the new regulations. With bank stock prices generally depressed--often selling below book value--many institutions are meeting the new requirements by slowing growth or even reducing loans and deposits, rather than selling new stock which would dilute the equity of present shareholders.

These new capital requirements, as much or more than over zealous bank examiners, lie at the root of the credit crunch--the apparent unwillingness of banks to lend. Of course, past losses on real estate and foreign loans have made management and regulators alike more cautious, and the losses themselves have made the task of achieving the new capital ratios more formidable for some banks. More generally, the recession makes most lending more risky, and thus subject to closer scrutiny.





At first, the Federal Reserve downplayed the credit crunch, and denied that there was any link between the capital requirements and the lack of growth in bank reserves and the money supply. From a policy standpoint, the Fed claimed to be supplying all the reserves the system wanted. The banking system was trying to restrain asset growth, and didn't want (demand) any additional reserves. The difference between supply and demand for bank reserves is an academic point, and a fine one at that.

Late last year, the Fed finally acknowledged the credit crunch and began to take aggressive monetary policy action to offset it. A second half percentage point discount rate cut came in February, accompanied by a similar reduction in the Federal funds rate, which was reduced a further 1/4 percent (to 6 percent) in early March. Equally important, since the beginning of the year, both bank reserves and the money supply have resumed growth.

Regulators are considering other moves to ease lending conditions. These include allowing the remaining portion of "restructured" (written down) real estate loans to be counted as performing if interest is in fact being paid in line with the restructuring agreement. Regulators may also be less critical of loans to "highly leveraged" companies, especially if these borrowers are successfully reducing debt levels and have a track record of meeting interest obligations in a timely fashion. Loans made to companies after they file bankruptcy may also receive more favorable treatment, since these "debtor in possession" credits are in a superior position to all pre-bankruptcy debt claims, and are usually paid off.

Outlook

The most likely outlook remains one of recovery beginning around the middle of 1991. As the new year began, there seemed to be two prerequisites for the upturn: a successful conclusion to the war in the Persian Gulf and a more accommodative monetary policy. The first of these has now been met and the second seems to be well underway, given the aggressive actions by the Federal Reserve since the beginning of December.

Against this background, the likely pattern for the economy is one of stabilization in the second quarter, followed by a resumption of economic growth during the summer months. First quarter GNP fell at a 2.8 percent annual rate, marking the second consecutive quarter of decline. The reduction of interest rates and gradual restoration of consumer and business confidence following the end of the Gulf war should lead to a pickup in final demand this spring.

However, employment, retail sales, new car volume, housing, nonresidential construction and business capital goods orders were all below the first quarter average in March, suggesting that even a spring turnaournd in activity could still result in slightly negative GNP in the second quarter. The Finance

Department's May forecast for 1991 is summarized in Table II-2.

In most previous recoveries, the initial upturn in demand has presented an opportunity for manufacturers, wholesalers and retailers to move unwanted inventory, thus delaying the pickup in production and employment for at least a few months. On this occasion, however, businesses have carefully controlled stock levels, actually liquidating inventories in the face of falling demand during the closing months of 1990. Hence, it's possible that this time around a pickup in demand could be quickly followed by an upturn in production as well.

Spark Lacking? The generally tightly controlled inventory situation may also lead to a less vigorous recovery than past experience might suggest. Production gains may come sooner but may also be less vigorous than in the past. Furthermore, just as the reduction of imports helped cushion the inventory cycle on the downside, so too will an increase in demand for foreign goods temper the rise in U.S. output during the upswing.

Improvements in the foreign trade balance are now coming equally from increased exports and the demand-related reduction of imports. While exports may expand moderately, gains may be limited by weaker economies overseas and by some strengthening of the dollar. Import growth will also pickup noticeably as consumer and business spending in the U.S. improve. Thus, foreign trade is not expected to be a major contributor to the recovery later this year or in 1992.

In addition, housing, which is normally the leading sector of final demand in an upturn, will probably be a less powerful force during the 1991-92 recovery. The housing industry's prospects are discussed in more detail in Chapter VI of this Report. Suffice it to say that the combination of underlying demographic trends and financial sector constraints will make a repeat of 1983's 60 percent jump in housing starts--a major feature of the last upturn--considerably less likely during this recovery.

Government spending growth is likely to lag, given budget pressures at virtually every level. The brief war boost to Federal defense outlays will fade before the end of this year. Some of the equipment expended in the war will simply not be replaced, while restocking ordnance and supplies will probably be stretched out over several years. Even taking into account the possibility that developments in Eastern Europe may be less favorable in the near future, a return to the cold war seems an unlikely prospect.

Most state and local governments are struggling to overcome budget gaps, which will almost certainly result in reduced outlay growth during both 1991 and 1992. In the longer term, demographically based education demands will boost state and local spending somewhat, but in the short run budget constraints are the controlling factor.

These elements suggest that the rapid acceleration in economic activity, which often gets underway about six months into the upturn, may be relatively short-lived and subdued during this recovery. Certainly, a quarter or two of 5 percent plus real growth later this year or in 1992 should not be ruled out. But an extended period of boom-like activity in which the economy quickly makes up for the recession's lost output, must be rated a less than likely outcome on this occasion. Sooner rather than later the economy will probably settle into a rather unspectacular 2-3 percent growth pattern, which closely approximates its long term potential.

Other sectors of the economy are likely to follow a more normal pattern of recovery. Consumer discretionary purchases are only postponable in the short run. An upturn in apparel sales should provide the first signs of the consumer awakening. Lower household debt burdens coupled with restored confidence should lead to increased spending on household durable goods and by the beginning of next year, a noticeable upturn in new car sales. The more manageable debt burden reflects not only the reduced level of borrowing over the past year or more, but also lower payments on adjustable mortgages and home equity loans, as well as the benefits of the recent upsurge in home refinancings at interest rates seen only briefly in the last decade or more.

The financial constraints on homebuilding relate to construction lending rather than mortgages, which indeed are now more attractive to lenders under the new bank capital requirements. Hence, existing home sales and home improvements should both be on the rise in the near future. These in turn, will provide a further boost to sales of furniture and appliances.

Typically, the upturn in business investment spending will lag a few quarters, as initial output gains are achieved with existing capacity, corporate balance sheets and profitability are restored and managers become convinced of the durability of the recovery. By mid-1992, however, business equipment outlays should be on the rise even if nonresidential construction spending remains subdued.

To summarize, much of the recovery rests on an upturn in consumer spending--neither surprising nor troubling given that household outlays account for two-thirds of GNP. Homebuilding and inventories will also contribute, but to a lesser extent than in the past. Business equipment should join the upturn by next year, but neither government spending nor foreign trade can be counted on for significant boosts to the economy as the recovery unfolds.

Unemployment is likely to rise for a few months even after the recovery gets underway. Initial production gains are often achieved with longer hours rather than increased hiring, and efforts to trim overhead staff will probably spill over into 1992, as firms strive to improve profitability. Even so, given very slow growth in the labor force, the jobless rate will probably top out at around 7 percent later this year.

Even the prospect of relatively modest job growth in 1992 will have a noticeable impact on unemployment with the adult population growth of less than 1 percent annually, the lowest in this century. The jobless rate could easily fall below 6 percent during 1992, and be back to pre-recession levels in the low 5 percent range the following year.

Good News on Prices. The inflation outlook has improved considerably in the last few months. That the Persian Gulf war has been fought without a major disruption of oil supplies was certainly reassuring to the industrialized world. Moreover, once repairs are made to facilities in Iraq and Kuwait, the need to finance the rebuilding of those countries will no doubt encourage increased petroleum supplies--and lower prices--on world markets. Oil prices of around $20 a barrel, with most of the risk on the downside, seems to the most likely prospect for the next 18 months at least.

Recessions throughout the English-speaking world, and slow growth in most other industrialized countries, has placed significant downward pressure on industrial commodity prices. Compared to March 1990, broad indexes of industrial commodity prices are down 5 percent in terms of U.S. dollars, and 15 to 20 percent

Table II-2
Selected U.S. Economic Indicators
($ billions)

			Forecast	
	1990	*Percent change*	*1991*	*Percent change*
Gross national product, $1982	$4,157	1.0	$4,150	-0.2
Consumption expenditures	2,682	0.9	2,695	0.5
Durables	427	-0.1	416	-2.8
Nondurables	911	-1.0	902	-1.0
Services	1,343	2.6	1,378	2.6
Investment	689	-3.9	643	-6.6
Nonresidential structures	121	-1.2	109	-9.8
Producers' durable equipment	395	2.8	395	0.2
Residential	177	-5.4	156	-12.1
Inventory change	-4	-	-17	-
Net exports	-34	-	-9	-
Government	821	2.8	822	0.1
Federal civilian	85	8.0	79	-6.9
Federal military	259	0.9	259	0.0
State and local	477	3.0	484	1.4
GNP deflator (1982=100)	131.4	4.0	136.4	3.7
GNP, current dollars	$5,465	5.1	$5,660	3.6
Personal income	$4,646	6.0	$4,812	3.6
Wage and salary employment (mill.)	110	1.8	110	-0.5
Unemployment rate (percent)	5.5	-	6.8	-
Housing starts (thous.)	1,203	-13.3	1,013	-15.7
New car sales (mill.)	9.5	-4.1	8.7	-8.4
Consumer price index	130.7	5.4	137.1	4.9

Percent changes calculated from unrounded data.
Source: U.S. Department of Commerce
U.S. Department of Labor
California Department of Finance (Forecast)

in terms of the Japanese Yen and most Western European currencies. These prices will probably continue to decline through mid-1991, and given the prospect modest further strengthening of the dollar, prices in the U.S. could well be stable for a considerable time after demand starts to rise.

Labor costs have also begun to moderate, reflecting slack demand and rising joblessness. While the current recession has not witnessed the major round of labor contract renegotiations and "give-backs" which were a feature of the 1980-82 episode, both pay and benefit increases seem to have peaked at a little over 5 percent annually, and are retreating into the mid-4 percent range. Past experience suggests that wages continue to moderate for one to four years after a recession has ended, so the downward pressure on compensation costs is just getting underway.

Each of these three fundamental elements--energy, industrial commodities and labor compensation--point to lower inflation ahead. Services prices, especially in the medical care area, remain a concern, but even in this area diminishing wage and cost pressures should allow some easing later this year. The troublesome uptick in "core inflation"--excluding food and energy--in the opening months of 1991 was partly related to sales and excise tax increases, which could again be a factor later this year, given budget pressures at the state and local level.

Another problem area is food, mainly that produced in California. Locally, attention is naturally focused on the effects of the drought and freeze on overall economic activity and individual farm communities. But the state provides half the nation's fresh fruit and vegetables, and in other parts of the country, the price and availability of grapes, peaches, eating oranges and summer salad greens will be of greater concern. California will continue to produce the majority of the nation's fruit and vegetables, but costs and prices this year will be higher. In addition, the drought is contributing to already scarce supplies of beef and prices reached record levels early this year. But all of these food-related factors taken together will probably add no more than a half a percentage point to consumer prices in 1991.

Given the other far more favorable trends, consumer price increases could easily be held below 5 percent on average this year, and less than 4 percent on a December-to-December comparison. With the outlook for a subdued pace of recovery inflation could be even lower in 1992.

Interest rates will reflect both the pace of recovery and the trend in prices. Short-term rates, guided by Federal Reserve policy, will probably reach a low shortly after the trough of the recession in the real economy around the middle of the year, with Federal funds and short term Treasury bills slightly below the levels of late March. If the pace of recovery is relatively modest, so too will be the rise in short term interest rates once the upturn gets underway.

Longer term interest rates are more attuned to inflation than short term monetary policy movements. Although there will undoubtedly be short reversals in trend, experience suggests that bond and mortgage rates more often reach lows considerably after recovery is underway. With the prospect for improvements in prices well into 1992, longer term rates could continue to fall even as short term rates rise. In fact, rising short term rates early in a recovery often demonstrate to bond investors a policy of keeping inflation in check, and could also be helpful in strengthening the dollar in foreign exchange markets, helping to attract overseas capital to U.S. markets.

III. CALIFORNIA OVERVIEW

California is participating in the national recession, and indeed figures for the final few months of 1990 suggest that the downturn has hit the state about as hard as the rest of the nation. A key question for the future is whether California's economy will now more closely track the nation as a whole, or if the state will regain its traditional "growth advantage".

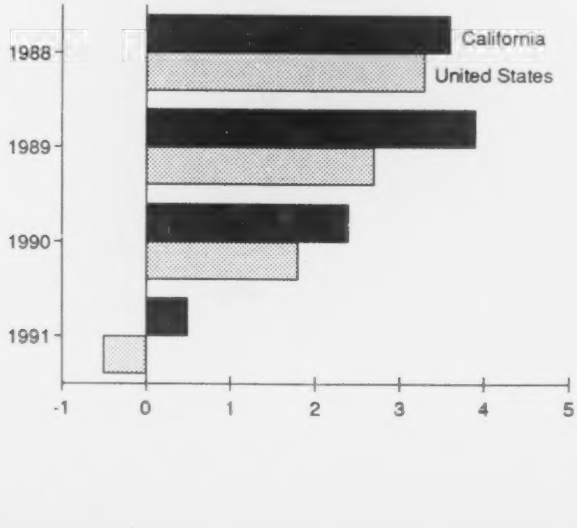
A pessimistic view, often voiced in the national media, holds that the drop in defense spending, high real estate prices, crowding in the major coastal urban areas and the associated diminution of "quality of life" elements, all point to an extended period of average or even below average growth for the state.

But close examination of trends in the state's economy is far more reassuring. For one thing, it is quite normal for California employment and income to slow to around the national average during at least a portion of a downturn--as most recently occurred in 1982. It is after all fairly difficult to have a national recession if the largest regional economy--accounting for over 13 percent of total U.S. output--does not join in. California has never been "recession proof" and no serious observer of the state's economy has ever claimed as much. On the contrary, developments in the U.S. economy remain the single most important element influencing California's performance.

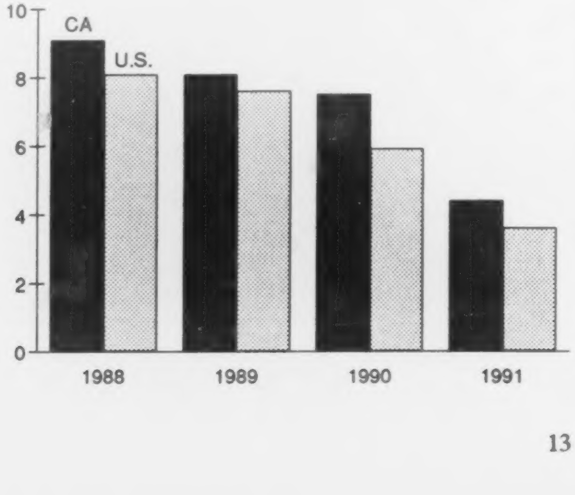
The recent narrowing of California's "growth spread" over the rest of the nation relates in part to the construction industry, which had maintained a high level of activity far longer than most other parts of the country. Manufacturing has also weakened, partly in such construction-related activities as lumber, stone-clay-glass and furniture, and also aircraft, reflecting both the decline in defense contracting as well as cost pressures in the commercial sector. However, despite these factors, the decline in California manufacturing employment has been less pronounced than in other areas of the country. Service producing activities, including retailing and the finance group, have slowed in line with the national experience.

Defense-related manufacturing is about half as important to the state's economy today as it was 20 years ago. Spending on space projects--of which California receives the lion's share--will be on the rise over the next few years. In the early 1970s, during the previous defense-related slump, space outlays were also on a

Growth in Wage and Salary Employment
(Percent change)



Personal Income
California and United States
(Percent change)



declining trend. The commercial aircraft market, although less robust than it appeared a few months ago, has sufficient firm orders to carry it through the mid-1990s, even considering the likelihood that some insolvent airlines may cancel orders in the near future.

Over the last quarter century, California's economy has continued to diversify, to the point that it is now very difficult to pinpoint any single "leading industry". To extrapolate prospects for aerospace, electronics, construction, agriculture, or tourism into an overall California outlook is both misleading and incorrect. The state's economy is far more complex and diverse than most people realize. It is for this reason that most observers and analysts within the state do not share the pessimistic view so often put forth in the national media.

Population Trends

The 1990 Census confirmed California's remarkable population boom of the 1980s. California's count as of April 1, 1990 was 29,760,021 an increase of 6.1 million or 25.7 percent over the decade--2.6 percent per year. The growth rate was nearly three times the national average, and fifth highest among the 50 states. California alone accounted for 27.5 percent of the nation's population gain during the 1980s. By far the most populous state, California is now nearly 1.7 times the size of second place New York.

In the 1980s, the focus of the state's growth was on the inland areas. Indeed, no coastal county was among California's ten fastest growing during the decade (although ninth ranked Solano technically borders an

Table III-1
Top 25 California Cities, 1990 Census

Ranked by total population, 1990

Rank		Total population	% change 1980-90
1	Los Angeles	3,485,398	17
2	San Diego	1,110,549	27
3	San Jose	782,248	24
4	San Francisco	723,959	7
5	Long Beach	429,433	19
6	Oakland	372,242	10
7	Sacramento	369,365	34
8	Fresno	354,202	63
9	Santa Ana	293,742	44
10	Anaheim	266,406	21
11	Riverside	226,505	33
12	Stockton	210,943	42
13	Huntington Beach	181,519	6
14	Glendale	180,038	29
15	Bakersfield	174,820	66
16	Fremont	173,339	31
17	Modesto	164,730	54
18	San Bernardino	164,164	38
19	Garden Grove	143,050	16
20	Oxnard	142,216	31
21	Chula Vista	135,163	61
22	Ontario	133,179	50
23	Torrance	133,107	2
24	Pomona	131,723	42
25	Pasadena	131,591	11

Ranked by percent growth, 1980-1990

Rank		Total population	% change 1980-90
1	Temecula	27,099	532
2	Palmdale	68,842	461
3	Moreno Valley	118,779	322
4	Adelanto	8,517	294
5	Laguna Niguel	44,400	263
6	Moorpark	25,494	227
7	Perris	21,460	214
8	Lake Elsinore	18,285	206
9	Ione	6,516	195
10	Victorville	40,674	186
11	Hercules	16,829	182
12	Colma	1,103	179
13	La Quinta	11,215	178
14	Apple Valley	46,079	175
15	Parlier	7,938	174
16	Cathedral City	30,085	171
17	Folsom	29,802	171
18	Rocklin	19,033	159
19	Hesperia	50,418	145
20	Avenal	9,770	136
21	Fontana	87,535	136
22	Walnut	29,105	133
23	San Jacinto	16,210	128
24	San Marcos	38,974	123
25	Patterson	8,626	121

Source: U.S. Bureau of the Census

estuary of San Francisco Bay). Coastal and Bay Area counties, which accounted for more than three quarters of the state's population in 1980, received only 61 percent of population growth in the decade to 1990.

Inland California grew by 42 percent in the 1980s, faster than any state except Nevada's 50 percent increase. The inland counties' population of 7.9 million would rank among the nation's top ten states, comparable to New Jersey's 7.7 million.

In percentage terms, fastest growth was in Southern California's "Inland Empire" of Riverside and San Bernardino counties. In the north, the six "Gold Country" counties (Amador, Calaveras, Nevada, Placer, El Dorado and Tuolumne) in the Sierra foothills also ranked in the top ten.

Table III-2
Unemployment Rates for Selected Counties
(Percent)

	1989	*1990*
California	5.1	5.6
Lowest rate counties		
Marin	2.6	2.7
San Mateo	2.6	2.8
Orange	2.9	3.4
San Francisco	4.1	4.0
Santa Clara	3.8	4.0
San Luis Obispo	3.7	4.1
Alameda	4.2	4.2
Contra Costa	4.1	4.3
El Dorado	4.3	4.3
Sonoma	4.3	4.4
San Diego	3.9	4.5
Santa Barbara	4.2	4.5
Napa	4.5	4.7
Sacramento	4.9	4.7
Placer	4.6	4.8
Highest rate counties		
Imperial	22.3	19.1
Sutter	13.0	13.8
Del Norte	12.7	12.6
Glenn	11.9	12.5
San Benito	12.4	12.5
Colusa	11.4	12.4
Madera	11.1	12.3
Trinity	12.3	12.2
Merced	11.0	11.6
Siskiyou	10.5	11.6
Stanislaus	11.3	11.3
Tulare	10.7	11.3

Source: California Employment
Development Department

In terms of numbers, five Southern California counties--Los Angeles, San Diego, San Bernardino, Riverside and Orange--accounted for well over half the state's population growth. Three counties--Riverside, San Bernardino and Sacramento--passed the one million mark for the first time during the 1980s.

Of California's 456 cities at the time of the Census, 44 had populations in excess of 100,000, up from 26 in 1980. Moreno Valley (Riverside County) counted nearly 119,000 in 1990, but wasn't even incorporated at the time of the 1980 Census. Southern California cities dominated the fastest growing list, with most located either in the Inland Empire or the high desert of north Los Angeles County.

Since the Census, there have been signs of a slowing in California's population boom. Births and foreign immigration remain at high levels, but migration from other states has slowed substantially. Indeed, if recent trends continue, California may experience net out-migration to the other 49 states in 1990-91. Even so, the combination of natural increase--the excess of births over deaths--and foreign immigration will probably add well over 600,000 to the state's population between mid-1990 and 1991.

The Census also revealed that California is in the midst of one of the most dramatic shifts in ethnic composition ever witnessed in such a large population. During the 1980s, the state's Asian population more than doubled from 1.2 million to 2.7 million. The Hispanic population increased nearly 70 percent to 7.7 million in 1990. Meanwhile, the black population (excluding Hispanics) rose by 17 percent to 2.1 million, while non-Hispanic whites increased only 7.4 percent to 17 million. Ethnic minorities now comprise 43 percent of the population, double the proportion just twenty years ago.

Labor Market Developments

California's unemployment rate, which averaged 5.1 percent in 1989 and early 1990, began a steady climb in the spring of last year, reaching 7 percent in January and 7.4 percent in February of this year. For all of 1990, the jobless rate averaged 5.6 percent. Civilian employment peaked at a little over 14 million in June, but declined by 350,000 by December. Employment averaged 13,840 thousand for the entire year, an increase of 0.5 percent over the 1989 level.

That the jobless rate did not increase even more reflects a substantial slowdown in the civilian labor force, which grew only 50,000 or 0.4 percent from December 1989 to December 1990, and just over 1 percent on an annual average basis. The dramatic slowdown in labor force growth from 2.7 percent the previous year reflects several factors. First, there is a normal cyclical tendency for labor force growth to slow during recessions. The decision to seek work is often influenced by the perception of job availability in the marketplace. When opportunities dwindle, some potential workers stop seeking jobs.

Second, the bottom of the 1970s "baby bust" occurred in 1975-76, and there are now fewer teenagers entering the workforce than at any time since the 1950s. Third, the recent slowdown in domestic migration is also affecting workforce growth. This is also a cyclical development, since in times of economic uncertainty fewer people are inclined to leave an existing job and home to seek opportunities in an unknown new area. Finally, the call up of reserves for the Persian Gulf war probably reduced the potential civilian labor force by 10-15,000 toward the end of last year.

The nonagricultural wage and salary employment data traced a pattern similar to the civilian figures, although growth in the first half of the year was stronger and the dropoff during the second half less pronounced. December employment was up 0.7 percent over the like 1989 level, compared to a decline of 1.5 percent in the civilian series. On an annual average basis, growth of 2.6 percent in nonfarm employment was five times the 0.5 percent increase in the civilian employment figures.

Table III-3
Population and Labor Force Trends
(In thousands)

	1988	1989	1990
Total population (July 1)	28,393	29,142	29,976
Percent change	2.4	2.6	2.9
Civilian labor force	14,133	14,518	14,670
Percent change	2.9	2.7	1.0
Civilian employment	13,385	13,780	13,846
Percent change	3.4	3.0	0.5
Unemployment	748	737	823
Percent change	-5.4	-1.5	11.7
Unemployment rate	5.3	5.1	5.6

Source: California Employment Development Department
California Department of Finance

The civilian and wage and salary employment data are different series, measuring different concepts. Civilian employment, which is based on a sample questionnaire of households, counts the number of people who have jobs, including those in agriculture as well as self employed in all industries. The nonagricultural data, which are based mainly on actual payroll records and, for the most recent months, a large sample of employers measure the number of jobs (rather than the number of people holding them) and exclude agriculture and most self employed workers.

Table III-4
Nonagricultural Wage and Salary Employment
Selected Areas
(In thousands)

Metropolitan Area	1989	1990	Percent change
Southern California:			
Los Angeles-Long Beach	4,220.6	4,297.8	1.8
Anaheim-Santa Ana	1,190.5	1,219.0	2.4
San Diego	964.6	995.1	3.2
Riverside-San Bernardino	688.2	739.9	7.5
Oxnard-Ventura	228.0	236.3	3.6
Santa Barbara-Santa Maria-Lompoc	149.2	151.8	1.7
Northern California:			
San Francisco	958.7	975.5	1.8
Oakland	880.0	901.0	2.4
San Jose	831.6	834.5	0.3
Santa Rosa-Petaluma	135.6	144.7	6.7
Vallejo-Fairfield-Napa	133.7	141.1	5.5
Salinas-Seaside-Monterey	110.7	113.1	2.2
Central Valley:			
Sacramento	602.1	629.4	4.5
Fresno	217.7	232.0	6.6
Bakersfield	167.3	171.4	2.5
Stockton	152.8	156.0	2.1
Modesto	115.3	120.9	4.9

Source: California Employment Development Dept.

Over time, growth in the two series tend to be roughly the same, although in any given year there can be divergence. In 1990, however, the difference in the two series was unusually large and difficult to explain. One possible explanation relates to part-time or dual jobholding, which often increases in a recessionary period when there may be fewer full time job opportunities. But an increase in part-time jobs is almost always associated with reduced growth in average wages per worker. The opposite was the case in 1990: average wages were up 4.9 percent, compared to 3.2 percent in 1989.

A second possibility relates to the fact that recessions often hit small businesses and sole proprietors harder than larger firms. Hence, the weaker performance in the civilian series may reflect a drop in the number of self employed. Agriculture is not a likely source of the variance between the two series, as available data on agricultural wage and salary employment indicate growth on a par with the nonfarm figures.

Finally, there is the possibility that sample variation is affecting the civilian data. The household sample on which the civilian employment figures are based is not a "straight" random sample of all households in the state. Instead, efforts are made to capture trends among various age and ethnic groups, and the sample is drawn in such a way as to obtain statistically significant results for several subgroups of the population. The sample design is based on population patterns observed at the time of the 1980 Census. In a dynamic state such as California, these patterns have probably changed significantly over the last 11 years. By 1993, the 1990 Census will provide the basis for the monthly current population survey sample.

Industry trends in the wage and salary data show declines in goods producing industries and gains in most services producing activities last year. Construction managed to grow 1.6 percent on an annual average basis, but was down a sharp 8 percent on a December-to-December comparison. Among major manufacturing industries, gains were recorded in only a few nondurable goods industries: food processing, apparel, chemicals and rubber and plastics. Major durable goods categories all showed declines on both a yearly average and December comparison.

Service producing employment grew 3.3 percent on an annual average basis and just under 2 percent on a year-end comparison. Utilities, diverse services and government all grew more than 3.3 percent, while trade and the finance, insurance and real estate group recorded slower growth.

Regional figures, detailed in Table III-4, show above average growth in most inland metropolitan areas, led by a 7.5 percent gain in Riverside and San Bernardino counties. Central Valley areas with the exception of Stockton also registered above average gains. In the major coastal regions, growth in Southern California was generally more vigorous than in the Bay Area. Ventura and San Diego counties each posted employment gains of over 3 percent. In the Bay Area, northern counties including Sonoma, Napa and Solano registered robust increases in the 5-1/2 to 6-1/2 percent range. Reflecting its significant high technology manufacturing orientation, the San Jose area showed the weakest increase, with jobs up only 0.3 percent in 1990.

Personal Income

California personal income increased 7.5 percent last year to $622.5 billion. The gain was considerably above the national growth rate of 5.9 percent, but less than California's 1989 8.1 percent rise. The previous

Table III-5
Personal Income Among the Leading States

Total income ($ bill.)	*1988*	*1989*	*Per capita income*	*1988*	*1989*
CALIFORNIA	$535.7	$579.2	Connecticut	$23,190	$24,683
			New Jersey	22,265	23,778
New York	352.1	378.3	Massachusetts	20,898	22,174
Texas	248.3	266.8	Alaska	19,237	21,656
Florida	203.8	223.6	New York	19,663	21,073
Illinois	204.0	219.4	Maryland	19,639	21,013
Pennsylvania	193.6	207.9	New Hampshire	19,410	20,267
New Jersey	171.8	183.9			
Ohio	167.6	178.6	CALIFORNIA	18,915	19,929
Michigan	151.4	161.8			
Massachusetts	123.1	131.1	Nevada	17,849	19,269

Note: States are ranked by 1989 figures.
Source: U.S. Department of Commerce, Bureau of Economic Analysis

year's increase had been held down about 1/2 percent by the effects of the Loma Prieta earthquake, and the underlying slowdown in 1990 was somewhat greater than the percentage figures indicate.

After adjusting for inflation, real income growth of 2.4 percent was the smallest increase since the 1982 recession, but still well above the national gain of less than 1 percent. However, the difference between state and national real incomes entirely reflects California's stronger population growth. Real per capita income was down fractionally in both California and the nation.

Wages and salaries, which account for just under 60 percent of total income, increased 7.3 percent, with industry gains ranging from almost 12 percent in services to a little over 3 percent in construction and manufacturing. The strong gain in services reflects both employment growth and fairly substantial bonus income, mainly in the professions. In recent years, Federal tax law has made it advantageous for professionals and other small businesses to recognize income in the form of wages (bonuses) rather than profits in their professional corporations. It is believed that Federal tax rate increases, effective in 1991, encouraged high income taxpayers to accelerate the recognition of income into 1990 to avoid the higher 1991 tax rate.

Other labor income, mainly employer paid insurance and pension contributions, increased 6.5 percent, slightly less than the rise in wages. In recent years, other labor income has been declining slightly as a percent of total employee compensation, reversing a long post World War II trend. This reflects in part the increasing importance of bonuses--for which benefits are not usually paid--within wage income.

Proprietors' income increased 8.3 percent, despite a small decline in farm incomes. The farm data are early estimates based on very incomplete data, but do take into account permanent tree and vine damage resulting from the December-January freeze. Reduced shipments of citrus and other fruits and vegetables will mainly affect first half 1991 farm income.

The large 9.4 percent rise in nonfarm proprietors' income is distorted to some degree by the effects of the earthquake on 1989 income. Uninsured damage to unincorporated businesses represented a reduction in 1989 income. Without the quake effect, proprietors' income would have been up a little more than 7 percent last year.

Table III-6
Personal Income in California, 1989 and 1990
($ billions)

	1989 a/		*1990*	
		Percent change		*Parcent change*
Total	$579.2	8.1	$622.5	7.5
Wages and salaries	342.1	7.1	366.9	7.3
Other labor income	32.8	8.3	34.9	6.5
Proprietors' income	55.1	4.6	59.7	8.3
Farm	5.6	-10.9	5.5	-1.2
Nonfarm	49.5	6.7	54.1	9.4
Interest	84.8	19.0	90.4	6.6
Dividends	14.2	12.9	15.4	8.5
Rent	2.0	-52.9	2.2	9.8
Transfer payments	75.5	8.3	82.5	9.2
Less: Contributions for social insurance	27.7	10.9	29.9	8.1
Plus: Residence adjustment	0.3	38.8	0.4	19.0

a/ Reflects Loma Prieta earthquake.
Percent changes calculated from unrounded data.
Source: U.S. Department of Commerce, Bureau of Economic Analysis
California Department of Finance

Property income--dividends, interest and rent--increased 7 percent last year. Interest income rose only 6.6 percent, reflecting the declining trend of interest rates during the year. Dividends were up 8.5 percent and rental income almost 10 percent. The rent increase is also distorted by earthquake damage to homes which reduced 1989 income. Excluding the quake effects, the trend of rental income would have been down during 1990, reflecting past increases in home prices, which boost depreciation charges against imputed rent of owner occupied houses.

Transfer payments, consisting mainly of social security benefits, state and local government pensions and welfare payments, increased 9.2 percent last year, about the same as in 1989.

California Consumer Prices

Consumer prices in California--based on a population weighted average of the Los Angeles basin and San Francisco Bay Area regional indexes--increased 5.5 percent on an annual average basis in 1990, about the same as the nation's 5.4 percen [illegible] e. On a year-end comparison, prices in California were up 6.4 percent, compared to 6.1 percent nationally.

As shown in Table III-7, there was considerable difference in the rate of price increase between the two major regions of the state. In the Los Angeles five county region, consumer prices increased 5.9 percent last year, while in the ten Bay Area counties, prices rose only 4.5 percent. Housing--the largest single category in the consumer "market basket"--was the main source of the difference between the two areas. Housing costs rose 5.7 percent in the Los Angeles area, 2 percentage points more than the Bay Area's 3.7 percent rise. Homeowners' costs rose almost 7 percent in Los Angeles, but only 4.2 percent in the San Francisco region.

Price increases for most other major expenditure categories were also higher in the Los Angeles region than in the Bay Area. Apparel prices jumped 6.8 percent in the south, but rose a modest 3.2 percent in the north. Transportation costs--mainly reflecting gasoline price movements--rose 5.8 percent in Los Angeles against 5.1 percent in San Francisco. Medical and food prices also rose moderately more in the south than the north. Entertainment prices were the only relative bargain in the Los Angeles region, rising 3.7 percent compared to 5.7 percent around the Bay.

Price movements in San Diego, reported only twice a year, were similar to those in the Los Angeles region. The annual average increase in the San Diego consumer price index was 6 percent in 1990.

Retail Sales

Sluggish real income growth was reflected in retail spending, but the sales weakness was slightly less pronounced than in the nation. Taxable retail sales (which exclude groceries and prescription medications) increased 3.3 percent in 1990, following an 8.2 percent gain in 1989.

U.S. Department of Commerce data, which include food and medicine, but are based on a sample of retailers, show an increase of 4.6 percent for the year, following a 9 percent increase in 1989. Commerce Department figures for the nation show a 3.8 percent rise last year, about a percentage point less than the state's increase.

Sales generally weakened in the second half of the year. Taxable sales in the fourth quarter were up only

Table III-7
Consumer Price Indexes, 1990
(1982-84=100)

	U.S.	*Percent change*	*San Francisco*	*Percent change*	*Los Angeles*	*Percent change*
All items	130.7	5.4	132.1	4.5	135.9	5.9
Food	132.4	5.8	135.7	5.1	130.3	5.5
Food away from home	133.4	4.7	135.2	4.7	129.1	4.4
Residential rent	138.4	4.2	151.0	4.7	149.6	4.5
Homeowners' cost	144.6	5.3	159.7	4.2	158.7	6.9
Fuel and other utilities	111.6	3.5	125.1	4.3	124.5	4.2
Apparel and upkeep	124.1	4.6	107.5	3.2	126.4	6.4
Transportation	120.5	5.6	114.7	4.7	126.5	5.8
Medical care	162.8	9.0	160.5	8.5	163.3	9.0
Entertainment	132.4	4.7	140.7	5.7	125.4	3.7
Other goods and services	159.0	7.7	161.0	5.6	166.3	7.1
Special indices:						
Goods	122.8	5.2	122.8	4.9	122.9	5.4
Services	139.2	5.5	140.7	4.4	147.5	6.3
Energy	102.1	8.3	114.1	9.9	107.9	9.8
All items excl. medical care	128.8	5.2	130.6	4.3	134.3	5.7
All items excl. shelter costs	128.2	5.4	128.0	4.7	131.1	5.6

Source: U.S. Department of Labor, Bureau of Labor Statistics

1.6 percent from the comparable year earlier period, a gain that was more than accounted for by a 29 percent increase in gasoline service station sales. The jump in gasoline sales was entirely price related; the volume of fuel sold actually dropped about 3 percent. Without the rise in dollar sales of gasoline, total retail sales would have declined about 2 percent from the comparable 1989 level.

Apart from service stations, sales were weak across the board during the crucial year-end selling season. Nondurable goods stores fared somewhat better than those specializing in durable goods. Apparel store sales rose 4.4 percent, while grocery and specialty stores and eating and drinking places posted gains in the 2-1/2 percent range.

Most durable goods stores, on the other hand, posted sales declines on a fourth quarter comparison, led by a 15 percent drop in farm supply stores and a 7-1/2 percent decrease in building materials outlets, the latter reflecting the construction slump. Home furnishing and appliance dealers saw sales drop more than 5 percent. General merchandise outlets, including department stores--which sell a mixture of durable and nondurable goods--registered virtually no change in sales between the fourth quarter of 1989 and 1990.

Table III-8
Taxable Sales by Retail Stores
($ millions)

	Full Year 1990		*Fourth Quarter 1990*	
	Amount	*% change from 1989*	*Amount*	*% change from 1989*
Apparel stores	10,345.2	6.2	3,131.0	4.4
General merchandise and drug stores*	30,556.7	4.1	9,533.6	0.1
Specialty stores	23,773.1	6.6	6,936.0	2.3
Grocery stores**	14,876.8	4.6	3,800.4	2.4
Liquor stores	2,016.9	(0.3)	534.2	(2.5)
Eating and drinking places	23,275.1	4.8	5,798.7	2.4
Home furnishing & appliance	9,576.1	1.8	2,663.9	(5.3)
Farm and garden	3,658.7	1.8	861.4	(15.4)
Building materials	14,190.7	(1.0)	3,327.3	(7.6)
New car dealers	25,827.7	(2.7)	5,981.8	(2.6)
Gasoline Service Stations	15,861.9	10.7	4,432.4	29.2
Other Automotive	7,673.8	(0.7)	1,737.2	(5.8)
Total Retail Stores	181,631.9	3.3	48,738.0	1.6

*Excludes prescription drugs **Excludes food for home consumption

Source: Board of Equalization

New car dealer sales were off about 2-1/2 percent for both the quarter and the full year. New car registrations dropped only 1 percent for the year, suggesting that rebates and other price concessions more than offset rising sticker prices of new vehicles. Used car dealer sales dropped 5 percent on a fourth quarter comparison, while sales by RV and mobile home outlets plunged 21 percent.

It should be recognized that the fourth quarter of 1989, against which the most recent sales figures are being compared, included the Loma Prieta earthquake which disrupted sales throughout the Bay Area. The small year-to-year sales gains in 1990, therefore, are indicative of a very weak retail sector, with consumer buying lagging significantly behind the rise in prices. Indeed, based on very preliminary indications, nominal retail sales in the first quarter of 1991 may well have fallen below the like year earlier period.

Construction and Real Estate

Both residential and nonresidential construction registered sharp declines during 1990. Homebuilding collapsed from an annual rate of 250,000 units in January 1990 to less than a [illegible]0,000 unit pace in December. For the entire year, 164,000 units were authorized for construction, a 31 percent drop from the previous year and the lowest volume since 1982.

In the existing home market, volume dropped 17 percent last year to 446,000 units, while median prices were 5 percent below peak levels reached in mid-1989. Price movements reflect the mix of homes sold as well as individual price changes. It is not clear, however, whether the change in median price is now under- or over-stating movements in individual market values. Most observers agree that in the high priced coastal metropolitan areas, many houses sold in the first half of 1989 would fetch lower prices in today's market. In contrast, lower priced homes--below

$200,000--continue to register modest price increases of 5 percent or less.

In the fourth quarter, prices seemed to stabilize, although sales volume continued to sag. The sales data represent escrow closings, and thus lag actual sales agreements by about 45 days. Agents indicate that there has been some pick up in volume during the opening months of 1991, although this has yet to be reflected in the closings data.

The value of nonresidential building permits fell 7 percent in 1990, led by a 15 percent drop in commercial construction activity, which includes office buildings, retail stores and hotels. Inflation in nonresidential construction was about 2-1/2 percent last year, thus real volume was down 10 percent overall and nearly 18 percent in the commercial sector. The drop in commercial activity reflects excess supply of both office space and hotel rooms, situations which are likely to get worse before they get better.

The California Recovery

Assuming a moderately paced U.S. recovery gets underway around mid-year, the California economy in 1991 will be something of a mirror image of the 1990 performance: a continuing decline in activity through the first few months of the year, giving way to sluggish growth in the second half. Improvements in electronics, services and home building will set the stage for a return to more normal growth in 1992.

The outlooks for individual sectors are discussed in more detail in the following three chapters, and key indicators are summarized in Table III-9. The main elements in the upturn include:

- A revival in the nondefense electronics industry by the second half of this year, aided by growth in exports--new orders figures are already pointing in this direction;
- A smaller decline in defense-related aerospace manufacturing;
- Stable prices and lower interest rates encouraging a recovery in homebuilding by early summer;
- Gradual recovery in the more traditional durable goods industries, including construction-related sectors such as lumber, furniture and stone-clay-glass;
- A strengthening in service sector growth as real incomes improve.

Employment gains this year will be modest, perhaps only a few tenths of a percentage point above the national trend. For California, this is typical of the later stages of recession and should not be mistaken for a major secular shift in the state's performance relative to the rest of the nation.

Income gains will be held back by lower average wage increases (reflecting smaller bonuses and the higher jobless rate), narrower increases in interest and dividend incomes in line with national trends and a significant decline in farm incomes related to the drought and freeze. Real incomes will benefit from

Table III-9
Selected California Indicators

	1990	*% Change*	*1991*	*% Change*
Personal Income ($ bil)	622.8	7.5	650.4	4.4
Nonfarm W&S employment (thous)	12,875	2.4	12,938	0.5
Mining	40	0.3	42	3.7
Construction	655	1.1	581	-11.3
Manufacturing	2,130	-1.5	2,066	-3.0
High Technology	695	-3.2	653	-6.0
Transporation/utilities	629	3.6	638	1.4
Whlse & retail trade	3,030	1.9	3,059	1.0
Finance group	840	0.9	844	0.5
Services	3,478	5.2	3,621	4.1
Government	2,072	3.7	2,088	0.8
Unemployment rate (%)	5.6	--	7.7	--
Housing permits (thous)	166	-30.3	125	-24.8
Consumer price index	135.0	5.5	141.3	4.7

the sharp reduction in inflation expected later this year. Lower commodity and energy prices and reduced growth in compensation costs should be reflected in moderating consumer price increases before mid-1991.

The pickup in real incomes and renewed consumer confidence should, by summer, encourage a rebound in retail sales. Clothing and other softgoods will lead the way, followed by a strengthening in the new car market and a gradual pickup in household durable goods purchases on the back of the housing upturn. Sales will also be given a boost by a pickup in travel spending, even if foreign visitor traffic initially remains weak. Travel industry sources indicate that Americans are planning vacations at home this year rather than overseas.

By 1992, the economy should be considerably better. Recovery and improved consumer confidence nationally should, by then, lead to a resumption of migration to California from other parts of the nation. This would give a further boost to housing, retailing and services.

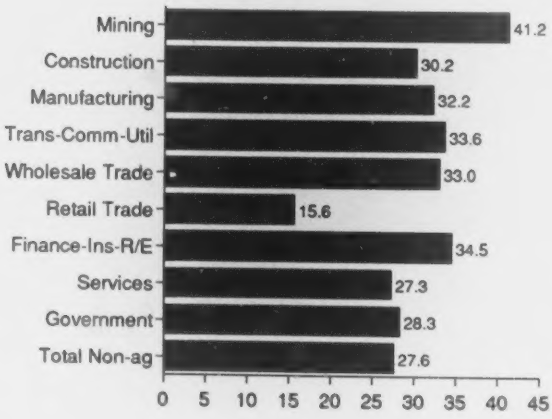
The state's financial institutions are in far better condition than their counterparts in the Northeast and Southwest, and have had generally more favorable experience lending in California than in other parts of the nation. Hence the credit crunch is likely to be less of an impediment in California than elsewhere, especially after the new bank and thrift capital requirements are met later this year.

Employment, income and sales gains next year should outpace the national average by a more normal margin, especially if improved weather conditions give an extra boost to farm incomes. Some problems remain, however. Aerospace manufacturing will continue to decline, although steps taken early on to reduce overhead costs will mean fewer layoffs in 1992 and subsequent years. Also in the aftermath of the Persian Gulf war, there may be some small rise in Defense Department procurement outlays, especially for sophisticated search and navigation instruments.

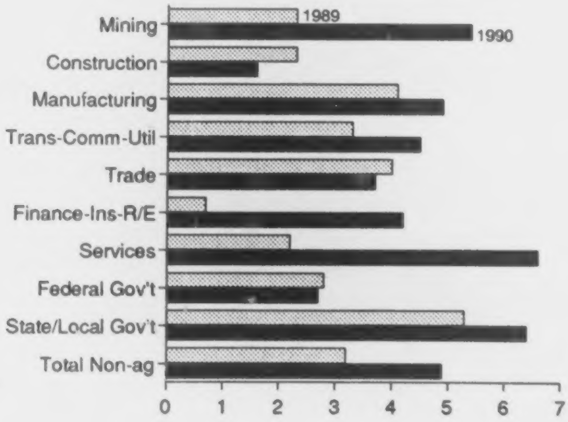
Commercial construction will lag, although this is a fairly normal development in the first two years of recovery. Even with an upturn in migration, demographic forces and some lender caution also suggest the homebuilding recovery will be less vigorous than in the past. Nor should California homeowners expect dramatic increases in home prices. Stable prices are essential to any housing upturn. More to the point, the dwindling number of young adults in the population points to less vigorous housing demand for some years to come.

Despite these cautions, by 1992 California's economy should be in the midst of a solid and durable expansion. Employment will quickly regain the modest losses of late 1990 and early 1991. With slower labor force growth, the drop in the jobless rate will be relatively rapid. Moderate inflation should continue next year as well, permitting further gains in real incomes and consumer spending. In short, next year will see a return to far more normal conditions in the California economy.

Average Wages by Industry, 1990
($ thousands)



Percent Change in Average Wages
1989 and 1990



IV. MANUFACTURING

Despite the cyclical reversals of the last year or so, one of California's major economic success stories of the last decade has been the strength of manufacturing. Indeed, even during the recession, California has lost a smaller proportion of factory jobs than the national average--despite the drop in defense spending and its effect on the state's important aerospace industries. Between 1980 and 1990, California's share of total U.S. manufacturing employment rose from less than 10 percent to more than 11.2 percent, including a gain of 0.1 percentage point in the face of declining employment in 1990.

The reasons for California's manufacturing success are soundly based in a highly productive, competitive workforce. According to the 1987 Census of Manufactures, value added per production worker in California is some 13 percent higher than the national average, while wage rates in the state exceed the U.S. figure by only 1 percent. In other words, by this measure of labor costs, California manufacturers enjoy a 12 percentage point advantage over the national average. Value added represents the difference between the value of shipments (sales) and the costs of goods and services purchased by manufacturing firms.

To be fair, some of California's advantage relates to its industry mix--the influence of the state's large high technology sector, where labor productivity is very high. But even within these industries, in most cases California has a clear advantage. For example, in computer manufacturing, California's average value added of nearly $319,600 per production worker is some 18.7 percent higher than the national average. California computer worker's wages average $23,450, about 11 percent higher than the U.S. figure.

As detailed in Table IV-2, most California manufacturing industries enjoy a "surplus" of per production worker value added over average wages when compared to the national average. Of those that don't, most are "population serving"--that is, supplying local or Far Western regional markets, rather than competing on a national or international scale. These include paper, lumber and chemicals. In each of these industries, California has an unfavorable relationship between wages and value added per worker. However, in each case transportation costs are such that local manufacture makes economic sense. For example, the lumber and paper industries of the southeastern U.S. have both labor and raw materials cost advantages over those in the Pacific Northwest (including Northern California), but the cost of transporting these heavy or bulky materials across the continent to markets in the West offset the Southeast's cost advantages. In addition, Northwestern lumber and paper mills have an export advantage to Japan and the Far East.

Table IV-1
California Share of National Employment
(Percent)

	1980	*1985*	*1989*	*1990*
Total nonagricultural	10.89	11.26	11.61	11.72
Goods producing industries:				
Mining	4.23	5.38	5.76	5.37
Construction	9.85	10.61	12.54	12.92
Manufacturing	9.95	10.78	11.13	11.21
Nondurables	7.86	8.15	8.94	9.25
Durables	11.34	12.57	12.67	12.60
Food and products	10.92	10.56	10.90	11.45
Textiles	1.70	1.98	2.32	2.35
Apparel	8.43	9.56	12.21	13.34
Paper and products	5.68	5.90	5.69	5.70
Printing-publishing	9.84	9.81	10.45	10.54
Chemicals	5.96	6.10	6.89	6.69
Petroleum and coal	13.99	16.03	18.54	16.95
Rubber and plastics	8.47	8.03	8.61	9.21
Leather	4.66	4.53	4.56	4.99
Lumber and wood	8.66	7.88	9.42	9.32
Furniture, fixtures	11.59	11.94	11.47	11.05
Stone, clay, glass	9.12	9.11	9.97	10.13
Primary metals	5.02	5.15	5.73	5.55
Fabricated metals	9.63	9.80	9.64	9.70
Nonelec. machinery	9.37	10.45	10.44	10.62
Electrical equip.	19.25	22.23	15.32	15.38
Transport equip.	14.79	15.17	14.80	14.77
Instruments	9.78	10.90	23.59	22.99
Miscellaneous	9.46	9.67	9.67	9.42

Source: U.S. Bureau of Labor Statistics
California Department of Finance

Among "export" manufacturing industries--those in which California accounts for an above average percentage of the nation's value added and thus supplies other parts of the nation as well as foreign markets--the labor cost to value added relationship is almost universally favorable. Most of these are durable goods industries, dominated by the state's high technology sector: industrial machinery (including computers), electronic equipment, transportation equipment (aircraft, missiles and spacecraft) and instruments. In addition, food processing, apparel, furniture and petroleum refining have a somewhat above average presence in California.

In high technology, California accounts for more than one quarter of the nation's value added in computers, electronic components and search and navigation instruments. In the case of missiles and spacecraft, 60 percent of U.S. production comes from California.

The state has about 18-1/2 percent of the nation's aircraft output, and this is the single export industry in which California does not enjoy an advantage in the relationship between value added and wages. The reasons for this may be related to the nature of defense contracting (which may include some "hidden" output) and the long initial or lead time common for new products in both defense and commercial aircraft manufacturing.

In the late 1980s, prototypes of new airliners, fighters and bombers consumed considerable manufacturing resources, often without logging a single shipment. Now that shipments of new commercial aircraft lines

Table IV-2
Wages and Value Added per Production Worker, 1987

	Production Workers		*Per Production Worker*		*Percent of US Average -- Per Production Worker*	
	Number (Thous.)	*Wages ($ mill.)*	*Value Added ($)*	*Wages ($)*	*Value Added*	*Wages*
Total all industries	1,240	$25,697	$108,044	$20,720	113.5	101.0
Food processing	116	2,315	134,448	20,028	113.4	109.1
Apparel	103	1,058	38,683	10,264	106.1	94.6
Lumber and wood	53	991	53,324	18,556	108.4	113.3
Furniture	51	768	49,345	14,965	99.5	98.0
Paper	28	703	100,358	25,204	94.0	99.8
Printing	82	1,681	116,963	20,599	104.5	104.8
Chemicals	27	586	205,630	22,106	78.7	83.3
Petroleum	10	340	303,510	35,448	126.2	110.1
Rubber & plastics	60	972	71,038	16,251	102.8	89.4
Stone, Clay, Glass	38	889	93,523	23,568	113.9	108.6
Primary metals	27	563	71,406	20,760	83.1	79.3
Fabricated metals	107	2,169	69,810	20,345	100.2	96.2
Industrial machinery	110	2,460	143,718	22,469	138.1	98.7
Computers	30	692	319,563	23,451	118.7	111.1
Electronic equipment	142	2,861	115,606	20,103	120.9	102.1
Communications equipment	15	345	234,187	23,027	149.7	104.2
Electronic components	83	1,696	109,221	20,463	118.5	110.4
Transportation equipment	153	4,365	141,795	28,567	126.0	99.2
Aircraft and parts	70	2,144	105,991	30,578	86.8	102.7
Missiles & space vehicles	38	1,218	288,830	32,297	130.2	101.4
Instruments	91	2,337	147,787	25,820	104.9	112.8
Search/navigation instr.	42	1,313	161,796	31,572	105.0	114.9
Measuring/controlling instr.	27	617	128,948	23,097	114.3	108.6
Miscellaneous manufacturing	27	398	65,584	14,803	101.6	99.7

Note: Tobacco, Textile Mill Products and Leather not reported for California due to small size of these industries in the state.
Source: 1987 Census of Manufactures

Table IV-3
Selected Statistics, California Manufactures, 1987
($ millions)

	Number of Establish-ments	*Shipments*	*Value Added*	*Capital Spending*	*Payroll*	*Employment (Thous.)*
Total all industries	49,930	$255,226	$133,996	$8,724	$57,185	2,111
Food processing	2,521	35,451	15,542	752	3,690	162
Apparel	4,972	8,285	3,988	73	1,659	127
Lumber and wood	2,671	6,714	2,848	163	1,321	65
Furniture	1,804	4,623	2,531	86	1,128	64
Paper	624	6,744	2,800	254	1,000	37
Printing	7,932	13,943	9,544	453	3,614	157
Chemicals	1,453	11,097	5,449	368	1,544	54
Petroleum	240	17,059	2,914	617	578	15
Rubber & plastics	2,012	7,787	4,248	295	1,657	80
Stone, Clay, Glass	1,651	6,591	3,526	219	1,261	49
Primary metals	705	4,976	1,935	317	831	35
Fabricated metals	4,744	13,765	7,442	377	3,421	144
Industrial machinery	7,388	27,044	15,737	1,080	6,500	214
Computers	652	16,293	9,427	767	3,284	93
Electronic equipment	3,493	26,541	16,451	1,430	7,111	260
Communications equipment	338	5,272	3,513	318	1,546	45
Electronic components	1,687	13,595	9,054	849	3,899	145
Transportation equipment	1,706	36,922	21,666	1,263	10,492	296
Aircraft and parts	395	14,623	7,430	565	4,564	125
Missiles & space vehicles	50	14,118	10,889	585	4,537	114
Instruments	2,025	19,912	13,375	716	6,198	192
Search/navigation instr.	244	9,811	6,731	350	3,583	99
Measuring/controlling instr.	918	5,239	3,443	200	1,510	52
Miscellaneous manufacturing	2,305	3,157	1,764	NA	716	38
Percent of U.S. Total						
Total all industries	13.5	10.3	11.5	11.1	12.1	11.1
Food processing	12.2	10.7	12.7	10.4	12.2	11.2
Apparel	21.7	12.6	12.0	9.6	11.9	11.7
Lumber and wood	7.9	9.6	10.0	8.9	10.4	9.2
Furniture	15.5	12.4	12.5	9.8	12.5	12.7
Paper	9.8	6.2	5.6	4.3	5.9	6.0
Printing	12.8	10.3	10.7	9.2	10.8	10.5
Chemicals	12.0	4.8	4.5	4.3	6.2	6.6
Petroleum	10.6	13.1	15.8	26.3	14.5	13.0
Rubber & plastics	13.9	9.0	9.6	8.6	9.5	9.7
Stone, Clay, Glass	10.2	10.8	10.7	9.2	10.3	9.4
Fabricated metals	13.1	9.3	9.9	7.7	9.7	9.8
Industrial machinery	14.2	12.3	13.2	15.5	12.8	11.6
Computers	30.6	26.1	28.4	34.7	30.2	27.7
Electronic equipment	21.9	15.4	17.1	20.5	18.4	16.6
Communications equipment	23.5	15.6	17.7	25.9	20.9	17.5
Electronic components	28.5	27.0	29.6	27.3	28.5	26.3
Transportation equipment	16.2	11.1	16.0	11.6	17.8	16.3
Aircraft and parts	24.4	18.7	18.5	21.2	21.9	20.7
Missiles & space vehicles	32.1	53.8	60.0	54.3	56.0	53.5
Instruments	19.6	18.4	18.6	19.0	21.3	19.3
Search/navigation instr.	21.5	27.0	27.3	26.2	28.8	26.7
Measuring/controlling instr.	21.7	19.5	19.9	21.7	18.8	17.6
Miscellaneous manufacturing	13.9	9.9	10.1	NA	10.5	10.3

Source: 1987 Census of Manufactures

are underway, the cost to sales relationship is no doubt improving. Even so, recent cost cutting measures by aircraft manufacturers suggest there may also be a need to become more efficient.

When total manufacturing employment--not just production workers--is considered, California's cost advantage seems to disappear. However, this is due mainly to the presence in the state of headquarters of many aerospace and electronics firms, and the relatively costly research and development (R and D) activities carried out locally, even among firms headquartered in other areas of the country.

R and D, in particular, is a vital part of high technology industry, but can be carried out independent of the manufacturing facility. A well educated workforce, the location of university and other research facilities and a "critical mass" of related activities--such as can be found in Silicon Valley or the aerospace complex of the Los Angeles area--are critical factors in the location of research and development activities.

Table IV-4
Manufacturing Employment
(In thousands)

	1989	*1990*	*Percent change*
Total manufacturing	2,161.4	2,132.7	-1.3
Nondurable goods	719.3	737.2	2.5
Food products	180.5	190.1	5.3
Textile products	17.0	16.7	-1.8
Apparel	131.6	136.8	4.0
Paper products	41.8	41.5	-0.8
Printing-publishing	163.1	166.9	2.3
Chemicals	73.4	72.6	-1.1
Petroleum	28.2	27.2	-3.6
Rubber-plastics	77.3	79.4	2.6
Leather products	6.3	6.1	-3.3
Durable goods	1,442.1	1,395.5	-3.2
Lumber and wood	71.4	68.2	-4.5
Furniture-fixtures	60.4	56.3	-6.9
Stone-clay-glass	56.7	56.3	-0.6
Primary metals	43.4	41.2	-5.0
Fabricated metals	139.3	133.8	-4.0
Industrial machinery	224.1	221.4	-1.2
Electrical equip.	268.0	260.7	-2.7
Transportation equip.	302.4	296.4	-2.0
Instruments	239.4	225.2	-5.9
Miscellaneous	37.1	36.1	-2.7

Source: California Employment Development Dept.
California Department of Finance

Of California's export industries, only food processing and petroleum refining are location based--that is, they exist because of local natural resources or transportation patterns. The others--aerospace, electronics, furniture and apparel--are in California from choice rather than necessity.

Despite the size of California's farm sector, food processing is in fact only marginally export oriented. The state supplies nearly half of the nation's preserved fruits and vegetables (more than half of fresh produce), and this is clearly an export sector--employing about one-quarter of the food processing industry. But California processes only 6 percent of the nation's meat and poultry (and is thus an importer from the rest of the country) and has slightly below average shares of value added in both dairy and bakery products, which must therefore be considered entirely population serving. Grain processing is also substantially underrepresented in California.

Petroleum refining benefits both from California's own oil resources, but also its coastal location and water transportation facilities, which allow easy import of crude oil from Alaska and Southeast Asia.

Furniture and apparel both benefit from California "lifestyle" elements--leisure wear and outdoor furniture are important parts of these industries locally. In addition, proximity to both complementary and competing manufacturing facilities in Mexico and the Far East have in many cases been helpful.

California designed and made lines of furniture and clothing may be supplemented by foreign made products. Depending on exchange rates and other factors, production may shift between onshore and offshore facilities. The recent strength in California apparel manufacturing--employment was up almost 5 percent on a year-end 1989-90 comparison--probably reflects some dollar-related shifting between foreign and domestic sources of supply. The uptick in the local industry was especially striking in the context of lackluster apparel sales last year.

Exchange rate movements aside, California's share of the nation's apparel industry employment has risen steadily over the past decade, from 8.4 percent in 1980 to 13.3 percent last year (Table IV-1). In 1990 alone,

Table IV-5
Manufacturing Activity
California Metropolitan Areas, 1987

Metropolitan Area	*Number of Establish-ments*	*Employ-ment (Thous.)*	*Value Added ($ mill.)*	*Shipments ($ mill.)*	*Leading Industries (Value added basis)*
Sacramento Valley					
Redding	239	5.0	$338.7	$732.1	Lumber, Instruments, Paper
Chico	222	5.7	274.3	671.0	Food, Lumber
Yuba City	117	3.1	197.6	512.7	Food, Lumber
Sacramento	1,415	41.6	2,802.3	5,495.7	Food, Missiles, Indus. Equip.
San Francisco/Moneterey Bay					
San Francisco-Oakland-San Jose	11,124	507.1	38,913.2	70,578.9	Electronics, Food, Printing
Oakland	3,211	107.0	9,479.3	22,629.1	Electronics, Trans. Equip., Instruments
San Francisco	3,153	81.9	5,374.6	9,053.1	Printing, Food
San Jose	3,298	275.7	20,865.3	32,056.6	Computers, Elec. Components, Instruments
Santa Cruz	375	12.2	995.7	2,076.7	Electronics, Food
Santa Rosa	657	19.2	1,090.2	2,088.0	Instruments, Food
Vallejo-Fairfield-Napa	430	11.0	1,108.2	2,675.5	Food
Salinas-Seaside-Monterey	252	7.8	603.6	1,195.1	Food
San Joaquin Valley					
Stockton	535	25.8	1,880.9	3,974.3	Food, Fab Metals, Stone-Clay-Glass
Modesto	379	23.2	2,209.2	4,625.4	Food, Paper, Fab. Metals
Merced	120	7.3	379.6	1,322.6	Food
Fresno	678	21.1	1,309.9	3,172.6	Food, Stone-Clay-Glass, Indus. Equip.
Visalia-Tulare-Porterville	301	11.2	705.9	1,686.6	Food, Printing
Bakersfield	357	7.7	532.5	1,455.2	Petroleum, Food, Rubber-Plastics
Southern California					
Santa Barbara-Santa Maria-Lompo	523	20.2	1,023.6	1,733.6	Instruments, Elec. Components
Los Angeles-Anaheim-Riverside	28,938	1,255.9	72,520.5	138,893.3	Aircraft, Instruments, Electronics
Anaheim-Santa Ana	5,855	254.6	14,860.0	25,887.4	Instruments, Electronics
Los Angeles-Long Beach	19,753	881.0	50,905.6	99,888.6	Aircraft, Missiles-Space, Instruments
Oxnard-Ventura	836	34.6	2,201.3	3,671.9	Computers, Instruments, Aircraft
Riverside-San Bernardino	2,494	85.6	4,553.6	9,445.3	Trans. Equip., Stone-Clay-Glass, Plastics
San Diego	3,041	120.0	6,426.8	10,996.6	Aircraft, Instruments, Electronics

Note: "Electronics" refers to combined Electronic and Non-Electrical Equipment when Computers are the major component of the Non-Electrical industry.

Source: 1987 Census of Manufactures

the state's share of the national industry jumped more than 1.1 percentage points.

The furniture industry, by contrast, faces something of an uphill battle at least in terms of retaining its manufacturing facilities in the state. Shipping costs from traditional furniture manufacturing centers in the Southeast and Midwest and California style factors have been important in the success of the local industry. But air quality problems associated with the finishing process are already forcing some facilities to seek locations elsewhere--often in Mexico and the Far East. Employment in the industry fell more than 10 percent over the course of 1990. Much of that drop no doubt relates to the slump in homefurnishings sales, but industry sources also indicate that there may be permanent losses as well.

The high technology aerospace and electronics sectors together account for one-third of all manufacturing jobs in the state. The electronics sector includes computers, electronic components, communications equipment and measuring and controlling instruments. Aerospace includes the aircraft, missiles and spacecraft and search and navigation instruments industries.

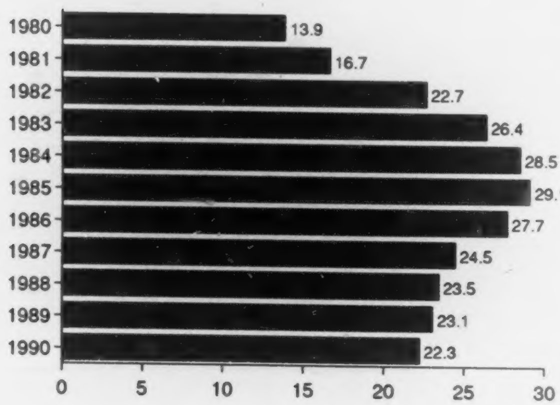
Neither sector depends on any special raw materials or transportation requirements unique to California, but concentrations are such that a critical mass of supplier industries--and talent--have developed in California's two major metropolitan regions. The Los Angeles area specializes in aerospace, and electronics is centered in the southern portion of the Bay Area.

Both of these industry sectors have been affected by the recession and, in addition, aerospace has been experiencing the effects of a longer term decline in Federal defense procurement outlays since the mid-1980s. Over the course of 1990, the high technology industries saw a 4 percent drop in employment, which affected all but the computer industry.

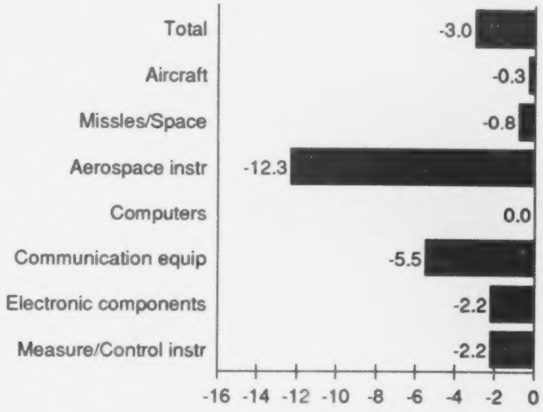
Until last year, rising commercial aircraft and space expenditures had cushioned the effects of declining defense outlays in most segments of the aerospace sector. However, competitive pressures have forced cuts even in commercial aircraft operations, despite substantial order backlogs. The weakness in defense outlays last year outweighed the continuing strength in space expenditures, resulting in a drop in missile and spacecraft employment. Search and navigation instruments have been weak for the last three years, although the success of these devices in the Persian Gulf war could lead to a pickup in demand in the near future.

Defense Department contract awards to California firms continued to decline in 1990, although nationwide contracting was up slightly. In California, $22.3 billion of contracts were awarded in the year ended September 30, off 3.5 percent from the 1989 level (see figure below). Last year's total was 23 percent below the 1985 peak, before adjusting for inflation. In real terms, the decline may be in excess of 35 percent over the last five years.

Defense Prime Contracts to California
U.S. Fiscal Years 1980-1990
($ billions)



California High Technology Employment, 1990
(Percent change)



In 1990, California's share of the nation's defense contracting fell from 19.3 percent to 18.4 percent. By itself, this drop is not disturbing, as the state's share normally fluctuates between 18 and 22 percent of the national total. However, there is some evidence of movement of operations from California into other parts of the nation, especially to states and Congressional districts of key members of Armed Services and Defense committees. Given the shrinking market for defense goods, firms are understandably seeking every possible advantage in order to retain business, including the promise of moving jobs to particular states and districts.

Electronics has experienced a relatively mild cyclical decline, cushioned to some extent by the weakness of the dollar and the resultant rise in export demand and diminution of imports. The electronics industries are characterized by very high productivity growth, thus unit demand must increase rather significantly before employment gains result. Components and measuring and controlling instruments witnessed employment declines in the 2-3 percent range last year, and the small communications equipment industry was off more than 5 percent.

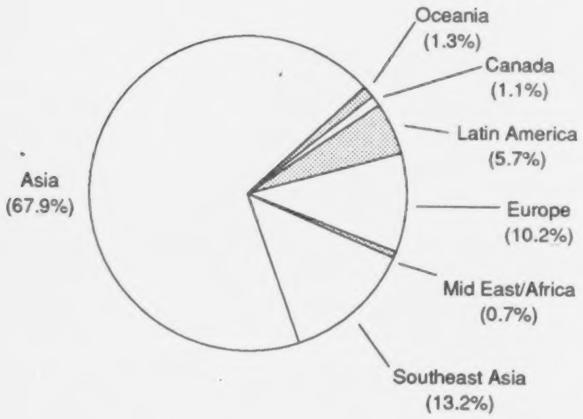
In contrast, computers maintained employment levels despite the recession--in no small measure reflecting the success of several Silicon Valley firms even in the face of lackluster underlying demand. The contrast between the high technology industries in California and those in New England is quite striking. The downturn has been most unkind to several prominent firms with major operations in the Northeast. While California's electronics industries have clearly felt the recession, innovative products have in many instances resulted in sales--and profit--gains for local firms.

Manufacturing Outlook. The stirrings of an upturn are already appearing in some manufacturing industries. Although 1991 will not be remembered as a good year for California manufacturers, in many sectors orders and output should be on the rise before the year is out. Next year offers the prospect of a solid recovery in all but a few industries.

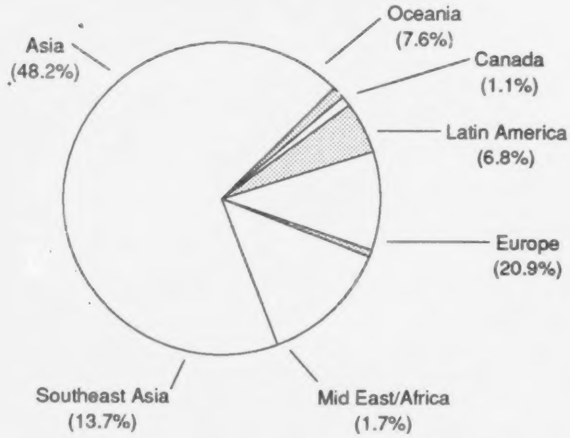
In electronics, orders have moved ahead of shipments in the components industry, pointing to at least stable employment and probably an upturn by midyear. The dollar's exchange value is helping keep down imports in both components and computers, but weaker economies in Europe may limit the potential for exports for at least a few months. Instruments, communications equipment and computers are all capital goods industries, and demand for these is likely to remain relatively subdued until broad economic recovery has been underway for at least two or three quarters. Components demand, in turn, rests on the requirements of these finished products. This suggests that a sustained upturn should be underway throughout the electronics sector by 1992.

Aerospace employment will probably decline throughout 1991, in many cases matching last year's perfor-

Imports into California Ports
By World Region, 1989



Exports from California Ports
By World Region, 1989



mance. However, the fact that both commercial and defense-related manufacturers are now taking measures to reduce payrolls and overhead costs suggests that by 1992 aerospace manufacturing will begin to stabilize.

At this point it is only possible to speculate as to what the effects of the Persian Gulf war will be in terms of new orders for aerospace instruments and equipment. The success of hitherto unproven high-tech military equipment is certainly a plus, and some missiles and other ordnance will undoubtedly be replaced over the next several years. At the same time, few aircraft were damaged or destroyed and Federal budget constraints--the overriding force behind the defense cuts--remain severe. Foreign sales, especially to coalition allies in the Middle East, may be in the offing and the situation in the Soviet Union may require some re-evaluation of European defenses.

However, a realistic view would still be for 3-5 percent annual declines in real defense outlays at least through mid-decade. The effects of declining defense spending will continue to be partially offset by commercial demand and growth in the space program, the latter a particular specialty for the California aerospace industry. Even so, growth in aerospace manufacturing employment does not seem likely in the near future.

Food processing is almost certain to feel some effects of the drought and freeze in 1991, although the impact may be less than many fear. Many tree crops in the Sacramento Valley may have benefitted from the severe freeze, and the north state generally has adequate water supplies to sustain the crops through the summer. Some annual crops such as tomatoes may actually replace more water intensive activities. Nonetheless, it is likely that food processing employment will drop below the 1990 level this year. Assuming enough water is available to preserve trees and vines in the driest areas of the state, and on the hope that normal rains return, 1992 should be a more normal year for food processors.

Construction-related manufacturing, including lumber, furniture and stone, clay and glass will continue to face weak demand until the housing upturn gets underway later this year. To repeat a recurring theme, full recovery will probably await 1992.

Many of the more traditional or "non-technology" industries in California are benefitting from the state's overall economic and population growth. Primary and fabricated metals, printing and publishing, chemicals, plastics and paper are all population serving industries in California--the state consumes more than it produces. But as the California market continues to expand so does the economic argument for locating more of these manufactures within the state rather than relying on imports from abroad or other areas of the U.S.

In other words, the California and Far Western market is achieving a "critical mass" which is encouraging these traditional industries to grow not only to meet incremental demand, but in some cases to displace goods

Table IV-6
California Trade by Major Country, 1989
($ millions)

	Exports		*Imports*			
	Amount	*% of U.S.*	*Amount*	*% of U.S.*	*Net Position*	*Total Trade*
Japan	$16,024	35.9	$37,036	39.6	($21,013)	$53,060
Taiwan	4,967	43.9	10,205	42.0	(5,238)	15,172
South Korea	5,730	42.5	8,947	45.3	(3,217)	14,677
Singapore	3,575	48.6	4,894	54.7	(1,319)	8,469
Mexico	3,580	14.3	3,794	14.0	(214)	7,374
Hongkong	2,571	40.8	3,394	34.9	(823)	5,965
West Germany	2,837	16.8	2,916	11.7	(79)	5,753
China	1,121	19.3	4,331	36.1	(3,210)	5,452
Australia	4,054	48.6	803	20.6	3,251	4,857
Malaysia	1,854	64.5	2,688	56.7	(834)	4,542
United Kingdom	2,909	13.9	1,515	8.3	1,393	4,424
Thailand	954	41.6	1,910	43.6	(956)	2,864
France	1,851	15.9	947	7.3	904	2,798
Italy	880	12.2	1,433	12.0	(553)	2,313
Philippines	1,187	53.8	1,120	36.5	67	2,307
Netherlands	1,365	12.0	397	8.3	968	1,762

Source: U.S. Bureau of the Census

brought in from elsewhere. In the late 1980s, it was growth in these industries that offset stagnation in California's high technology sector and helped boost the state's share of the nation's manufacturing output. Employment and output in these industries should recover along with the broader upturn around the middle of 1991 and continue next year as well.

International Trade

Goods in international trade valued at nearly $166 billion passed through California ports during 1990. The figure, which includes all ports of entry and exit, including overland to Mexico and air shipments as well as waterborne cargo, represented a 5 percent gain over the 1989 value--the smallest gain since 1982. In 1990, exports increased 8.8 percent, to $68.5 billion, while imports were up only 3 percent to $97.1 billion. The state handles about 18 percent of the nation's exports and 20 percent of imports to the U.S.

Trade through local ports includes not only goods originating in or destined for end users in California, but also goods trans-shipped through the state. Not surprisingly, four of California's top five (and eight of the top ten) "trading partners" are on the western side of the Pacific Rim. Neighboring Mexico (also a Pacific Rim nation) ranks fifth in trade volumes through California. All told, Asia and Oceania account for 70 percent of California exports and 82 percent of imports via the state.

Detailed figures available for 1989 show that Japan is by far the state's leading trade partner, with total volume of $53 billion, including $16 billion of exports from California and over $37 billion of imports into the state. There is substantial two way trade in electronics goods and components, and California is a significant port of entry (and final destination) for Japanese made automobiles and parts. Electronics is a major element of trade with many of the Asia/Pacific nations, often including the movement of partially assembled goods and components between manufacturers in California and overseas. In recent years, China

Table IV-7
Billion Dollar Exports and Imports
Through California Ports, 1989
($ millions)

Exports	*Value*	*% of US*
Computers	$8,182	33.4
Electronic components	7,617	47.0
Aircraft parts	2,843	31.0
Meats	2,353	51.6
Measuring, control instr.	2,132	29.6
Aircraft	1,642	11.3
Waste and scrap	1,629	32.3
Cotton	1,408	62.3
Refined petroleum prods.	1,286	27.9
Plastic materials	1,214	17.2
Motor vehicles	1,177	9.0
Special industrial mach.	1,139	23.1
Organic chemicals	1,130	9.8
Medical instruments	1,110	21.0
Communications equip.	1,037	19.8
General industrial mach.	1,007	16.0
Total, all commodities	62,049	17.8

Imports	*Value*	*% of US*
Computers	$13,001	58.2
Motor Vehicles	10,548	19.3
Electronic components	10,266	56.8
HH audio/video equip.	6,990	52.2
Apparel	4,967	23.5
Communications equip.	3,503	40.1
Motor vehicle parts	2,242	10.9
Toys and games	1,856	33.2
Rubber/plastic prods.	1,840	22.5
Leather	1,727	25.5
Photographic equip.	1,700	29.2
Iron and steel	1,399	15.6
Fish and seafood	1,323	24.4
Previously exported	1,172	12.7
Oth fabricated metal prods.	1,121	16.7
Major HH appliances	1,073	33.2
Furniture	1,067	22.0
Machine tools	1,066	17.8
Total, all commodities	94,080	19.9

Source: U.S. Bureau of the Census

has become a significant exporter of apparel and homegoods, while South Korea and Taiwan are taking a growing share of the U.S. home electronics and photographic markets.

In Europe, the United Kingdom, Germany, France and the Netherlands are major markets for a variety of California goods and commodities, especially almonds, cotton and nonmonetary gold. California imports a variety of manufactured goods from these and other European Economic Community nations.

The country figures are obviously largely dominated by the state's location on the Pacific Rim. This is less true of commodity data--especially for exports--which more closely reflect the composition of the California economy. The list of main exports is dominated by high technology goods--electronics, instruments and aircraft. Food and fiber are represented by cotton and meats (the latter increasingly to Japan). However, port data understate California's fruit and vegetable exports, much of which are shipped over land to Canada or trans-shipped to Arizona and the East Coast for final destinations in Europe. Unfortunately, an alternative state of origin trade data also understate California's farm exports, which are estimated to total nearly one-third of the state's $17-1/2 billion agricultural output.

Import figures reflect California's high technology concentration, but the billion dollar list also includes home electronics, apparel, autos, furniture, household appliances and seafood. On a commodity-by-commodity basis, the state's ports run a deficit even in the high tech sectors, but it is probably true that many of the state's high technology firms benefit from the ability to import lower cost components and finished goods from the Far East.

Outlook. Indications are that the overall increase in trade slowed during 1990, especially in the second half of the year. This reflects both softer demand in the U.S. and California but less rapid growth overseas. The weaker dollar exchange rate is helping to reduce imports of basic materials such as steel. More important for California, exports of computers and other electronics goods seem to be on the rise.

The prospect of dollar-related growth in exports could well be dampened by slowing economies overseas. Canada, the U.K., Australia and New Zealand (along with the U.S.) are all experiencing softer economies, while leading indicators in most other industrialized countries are pointing to an easing of growth in the next few months. While the combination of reduced imports and the gradual pickup in exports should help reduce the trade deficit, the overall growth in trade will probably remain sluggish at least through the first half of 1991.

V. SERVICE INDUSTRIES

Service producing activities, including not only the service industries but also wholesale and retail trade, finance, transportation-utilities and government, account for 78 percent of all nonfarm jobs in California. Generally less sensitive to the business cycle than goods producing activities, most service industries normally continue to grow during economic downturns, albeit at a reduced pace.

During the 1990-91 recession, there has been a modest interruption in growth of retail trade and the finance group (including real estate), but services, transportation-utilities and government have continued to add jobs.

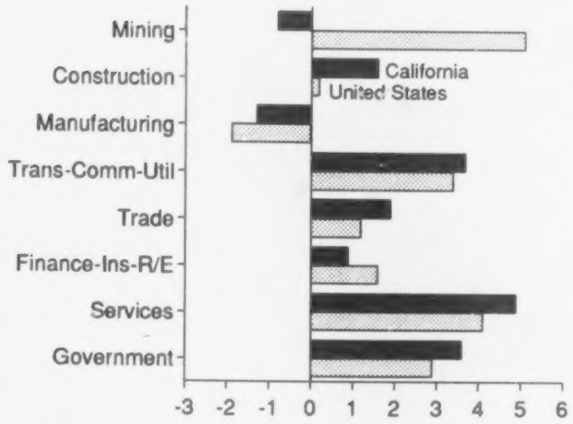
Services

The diverse services industry group is the largest sector in California, employing 3.5 million in 1990. It is also e fastest growing--having expanded by 5 percent last year and more than 6-1/2 percent in 1989--and probably the least understood. The sector encompasses such diverse industries as hotels, building maintenance, law, medicine and computer programming. In 1987, according to the Census of Service Industries, receipts of California service establishments (excluding private primary and secondary schools) totaled more than $156 billion.

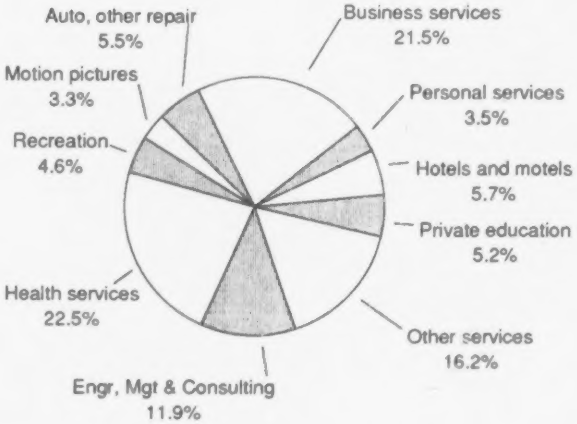
Although most service industries are, of necessity, population serving, it is possible to export services, and several of these industries are export or basic in California. The most prominent of these is motion picture and television program production and distribution, for which California accounts for more than half the nation's output. Computer programming and software is another example of a major service export. Hotels and motels would seem to be "export" by definition, but California's share of this industry nationally is about in line with the state's importance in the overall national economy, suggesting California's balance on travel and tourism may be about neutral.

Small businesses are more likely to be found in the service sector than in manufacturing. Although service employment accounts for about one-quarter of all nonfarm jobs, fully one-third of all establishments in California are classified in the service sector. Even so, some service industries such as hospitals, amusement

Employment Changes by Industry, 1990
(Percent change)



Service Employment by Type, 1990



parks, hotels and temporary employment agencies can employ hundreds or even thousands of workers.

Wage levels differ widely--the sector includes some of the lowest and highest paid industries, ranging from parking garages and video rental stores (with many part-time employees) to law, accounting and medical offices. Given the nature of services, wages often account for a relatively high proportion of total revenues. But services also include rental and leasing companies, where interest expense or the cost of purchasing the goods leased may be far more important than salaries.

Health care is the largest service industry, employing nearly 800,000 in 1990. Medical doctors' offices comprise the largest group within the industry, accounting for one-third of employment and half the number of establishments. Nursing homes are the second largest group in terms of employment, followed by hospitals and dental offices.

Business services is the second largest segment, with about 750,000 workers last year. Employment agencies--mainly temporary help--are the largest and fastest growing of the business services, accounting for nearly one-third of the sector's total jobs. Growth of temporary employment agencies in recent years reflects

Table V-1
Selected Statistics, California Service Industries a/, 1987

	Number of Establish-ments	*Receipts ($ mill.)*	*Employ-ment*	*Receipts per*		*Wages per Employee*
				Establ.	*Employee*	
Total	222,636	$128,546.0	2,248,466	$577,382	$57,171	$21,067
Hotels and lodging places	5,530	6,028.5	157,307	1,090,142	38,323	10,496
Personal services	18,585	3,816.1	122,266	205,331	31,211	10,474
Laundry, cleaning	5,637	1,821.3	47,406	323,089	38,418	12,240
Photo protrait studios	1,064	244.4	6,060	229,742	40,337	9,939
Beauty, barber shops	8,303	897.2	41,270	108,053	21,739	9,486
Shoe repair	345	31.7	972	91,809	32,586	9,778
Funeral services	703	334.0	5,204	475,171	64,190	17,683
Tax return & other	2,533	487.5	21,354	192,459	22,829	6,890
Business Services	36,247	27,026.4	626,751	745,618	43,121	17,130
Advertising	2,200	1,746.5	19,693	793,885	88,689	32,040
Consumer credit reporting	785	636.0	12,294	810,175	51,731	18,561
Mail, reproduction, steno	4,312	2,020.7	32,379	468,620	62,407	18,813
Services to buildings	5,721	1,823.1	76,382	318,672	23,868	11,084
Equipment rental/leasing	3,641	2,691.4	31,049	739,205	86,684	21,779
Personnel supply services	3,536	3,535.7	210,074	999,904	16,831	11,606
Computer services	6,545	9,530.2	105,939	1,456,107	89,959	32,368
Miscellaneous	9,507	5,042.7	138,941	530,424	36,294	13,517
Automotive services	19,705	7,715.5	112,535	391,550	68,561	15,995
Auto renting	1,281	2,226.7	16,949	1,738,258	131,377	18,914
Auto parking	1,695	542.4	8,221	319,983	65,974	11,746
Auto repair	14,710	4,297.8	68,186	292,169	63,031	17,297
Other auto services	2,019	648.6	19,179	321,247	33,818	10,608
Miscellaneous repair services	7,210	2,622.7	41,494	363,763	63,207	19,986
Electrical repair	1,932	889.9	13,490	460,601	65,966	22,342
Watch, clock, jewelry	229	32.5	763	141,895	42,587	13,389
Furniture	903	138.8	3,279	153,761	42,344	13,398
Other	4,146	1,561.5	23,962	376,630	65,166	19,772

efforts by firms in other industries to pare overhead costs, adding workers only in response to peak workload requirements.

The related engineering, accounting, research and management consulting group has only been identified as a separate industry since 1988. In 1990, the segment employed just over 400,000. Growth over the three years has been consistently the most rapid among the service industries (although the volatile motion picture industry can show higher growth rates on a short term basis). Engineering and architectural services are the largest within the group, followed by management and public relations and accounting.

Other services, as commonly reported, are slightly larger than the engineering and management group, with about 560,000 workers last year. Social services--mainly child day care--and legal services are the largest segments within this group.

In most areas of the country, amusements and recreation includes motion pictures, but in California motion pictures are identified as a separate industry. Amusements, which include live entertainment, professional sports, dance studios, physical fitness facilities and amusement parks, employ about 160,000. Until 1990, this had been among the leading growth indus-

Table V-1 (Continued)
Selected Statistics, California Service Industries a/, 1987

	Number of Establishments	*Receipts ($ mill.)*	*Employment*	*Receipts per*		*Wages per Employee*
				Establ.	*Employee*	
Amusements and motion pictures	15,795	$18,902.0	240,942	$1,196,707	$78,450	$23,137
Motion picture production and distribution	5,228	11,817.5	99,690	2,260,416	118,542	33,319
Motion picture theaters	939	749.8	14,086	798,501	53,230	7,138
Video rental	1,890	352.7	9,566	186,610	36,869	7,589
Live theater/band/entertainer	2,611	1,927.3	14,639	738,155	131,657	54,127
Commercial sports	394	674.8	9,542	1,712,703	70,719	35,785
Other including museums	4,334	3,105.7	84,278	716,578	36,850	10,224
Health services	58,109	28,009.4	463,209	482,015	60,468	24,982
Medical doctor offices/clinics	29,641	14,767.4	166,282	498,207	88,809	40,170
Dental offices/clinics	13,835	3,697.3	69,240	267,242	53,398	19,455
Other health practioners	9,060	1,854.2	30,925	204,653	59,957	18,260
Nursing homes	1,257	1,857.9	86,405	1,478,033	21,502	10,498
Hospitals	214	3,461.5	61,927	16,175,150	55,896	19,164
Laboratories and other	4,102	2,371.2	48,430	578,062	48,962	18,308
Legal services	19,307	10,419.4	111,948	539,667	93,073	38,005
Education excluding primary/secondary/colleges	1,790	853.7	17,595	476,914	48,518	15,620
Libraries	17	3.9	181	228,588	21,470	10,862
Vocational schools	573	467.0	8,726	814,983	53,517	17,662
Social services	5,945	1,163.8	47,293	195,768	24,609	9,394
Child day care	2,746	360.0	20,463	131,084	17,591	7,582
Engineering/management	31,573	21,236.7	297,275	672,621	71,438	29,061
Engineering/architechtural	9,515	9,197.9	107,460	966,675	85,594	34,692
Accounting/audit/bookkeeping	10,297	3,964.4	70,553	385,005	56,190	23,990
Research/development/testing	2,019	2,452.1	31,442	1,214,495	77,987	31,392
Management/public relations	9,742	5,622.3	87,820	577,119	64,021	25,411

a/ Firms subject to Federal income tax
Source: 1987 Census of Service Industries, U.S. Department of Commerce, Bureau of the Census

Table V-2
Services Employment
(In thousands)

	1989	*1990*	*Percent change*
Total services	3,307.8	3,468.6	4.9
Hotels and motels	191.7	199.2	3.9
Personal services	119.3	122.9	3.0
Business services	710.7	744.7	4.8
Auto, other repair	183.2	189.6	3.5
Motion pictures	115.6	115.3	-0.2
Recreation	149.0	159.4	7.0
Health services	752.8	782.0	3.9
Private education	170.7	180.4	5.7
Engr/mgt consult	378.2	412.5	9.1
Other services	536.7	562.5	4.8

Source: California Employment Development Department
California Department of Finance

tries within services, but last year employment increased only 3.5 percent, reflecting the overall slowing of consumer spending.

After dramatic gains in 1989 (following a labor dispute the previous year), motion picture industry employment stabilized at 115,000 last year. In most parts of the country the motion picture industry is confined to exhibitors and video rental stores. In California, these account for only one-quarter of total employment, with nearly 100,000 employed in "the industry", including production of motion pictures and television programs, as well as distribution and related services. California accounts for about 30 percent of total motion picture employment, but over half of the production jobs in the nation.

The remaining service industries include hotels, private education, automobile services (repair, rental, parking), other repair services and personal services. In the accompanying Census tabulation (Table V-1), private education excludes the largest segment, private primary and secondary schools. Within personal services, the fastest growing segment is tax preparation services.

Services Outlook. Annual growth in services employment has slowed to less than 5 percent in 1990--and only 3.5 percent on a December-to-December comparison--from more than 6 percent in both 1988 and 1989. Gains are likely to remain sluggish during the first half of 1991, but a gradual pickup should be evident toward the end of the year. Business services and the engineering and management group--which are quite sensitive to overall business conditions--should be among the first to show signs of an uptick. Hotels and amusements may remain sluggish through most of the year, but should strengthen in 1992. Efforts to contain health care costs--a key issue for both public and private health care systems--will probably keep health service growth in the 3 percent range. By 1992, services employment should resume more normal growth in the 5 to 6 percent range.

Wholesale and Retail Trade

The lackluster pace of retail sales in 1990 was reflected in a substantial slowdown in growth of wholesale and retail trade employment. On an annual average basis, trade employment grew less than 2 percent, and was up less than 1/2 percent on a year-end comparison. Trade is the second leading employment category in California, with over 3 million workers in 1990. Retailing employs over 2.2 million, and about 800,000 are in the wholesale segment.

Wholesale Trade. The 1987 Census of Wholesale Trade counted 53,773 wholesalers in California with

Table V-3
California Share of National Employment
(Percent)

Service producing industries	*1980*	*1985*	*1989*	*1990*
Transportation-utilities	10.62	10.86	10.72	10.86
Trade	11.16	11.38	11.54	11.61
Wholesale	11.03	11.74	12.25	12.31
Retail	11.21	11.26	11.31	11.38
Fin.-ins.-real estate	12.07	12.17	12.42	12.47
Services	12.07	12.02	12.20	12.34
Hotels and motels	10.52	10.79	11.95	12.32
Personal services	12.22	11.91	11.00	11.29
Business services	17.82	17.38	14.35	14.87
Auto, other repair	15.63	15.49	14.41	14.32
Motion pictures	31.51	34.92	30.05	32.10
Amusement-rec.	12.33	13.51	14.17	14.23
Health	10.49	10.27	9.90	9.47
Misc. services	11.07	10.64	9.99	10.39
Government	10.86	10.94	11.27	11.39
Federal	11.65	11.94	11.95	11.68
State and local	10.69	10.72	11.16	11.33

Source: U.S. Bureau of Labor Statistics
California Department of Finance

sales that year of $327.4 billion. Sales averaged a little over $6 million per establishment and almost $500,000 per employee. Wages amounted to less than 5-1/2 percent of total sales.

The vast majority of outlets--nearly 45,000--are merchant wholesalers, who purchase goods for resale. Included in this number are 4,000 importers and over 1,000 exporters. In addition to the merchant wholesalers, there are more than 4,000 manufacturers' sales offices and a similar number of agents and brokers.

As shown in Table V-4, motor vehicles were the leading category in 1987 with sales of $66 billion, followed by groceries ($50 billion), electrical goods ($32 billion) and professional and commercial equipment sales of $31 billion. Merchant wholesalers accounted for $207 billion or 63 percent of total sales. Manufacturers' offices, with only 7 percent of the outlets, accounted for $90 billion or 27 percent of sales. Agents and brokers sold just under $30 billion or 9 percent of the $327 billion total sales.

Retail Trade. Preliminary figures place total retail sales in California at $224 billion in 1990, a gain of 4.6 percent from the previous year. The annual increase was the smallest since 1982's 1.3 percent rise. Taxable retail sales, which exclude food and prescription medi-

Table V-4
Selected Statistics, California Wholesale Trade, 1987

	Number of Establishments	*Sales ($ mill.)*	*Employment*	*Sales per*		*Wages per Employee*
				Establ.	*Employee*	
Total	53,773	$327,370.4	684,516	$6,088,008	$478,251	$25,790
By type of operation:						
Merchant wholesalers	44,792	207,351.6	544,019	4,629,211	381,148	24,525
Manufacturers' representatives	4,233	90,162.4	110,278	21,299,877	817,592	31,554
Agents and brokers	4,748	29,856.4	30,219	6,288,211	988,002	27,525
By kind of business:						
Durable goods	34,644	196,919.4	425,100	5,684,085	463,231	26,980
Motor vehicles and parts	4,451	66,051.7	53,346	14,839,750	1,238,176	23,272
Furniture, homefurnishings	2,158	6,953.6	21,959	3,222,257	316,664	24,767
Lumber, construction material	1,946	8,538.9	24,199	4,387,948	352,864	24,849
Commercial equipment	6,068	31,012.7	104,624	5,110,866	296,421	30,748
Metals, minerals	1,104	10,728.7	15,802	9,717,995	678,944	28,026
Electrical goods	4,952	32,103.3	70,017	6,482,898	458,507	29,394
Hardware	2,453	7,204.7	27,307	2,937,085	263,840	25,649
Machinery	7,087	19,107.1	69,690	2,696,074	274,172	26,110
Other	4,425	15,218.7	38,156	3,439,248	398,854	22,132
Nondurable goods	19,129	130,451.0	259,416	6,819,541	502,864	23,840
Paper	2,078	10,422.6	31,177	5,015,670	334,303	22,770
Drugs and sundries	723	7,364.9	13,405	10,186,632	549,417	26185
Apparel	2,815	10,419.2	28,934	3,701,312	360,102	23,122
Groceries	5,680	49,879.1	96,515	8,781,535	516,802	23,686
Farm products	359	3,554.9	3,241	9,902,226	1,096,853	21,239
Chemicals	1,293	8,690.3	13,396	6,721,051	648,725	28,826
Petroleum	968	20,985.1	11,862	21,678,786	1,769,100	25,389
Alcoholic beverages	512	6,687.0	16,601	13,060,635	402,810	28,501
Other	4,701	12,447.9	44,285	2,647,918	281,085	21,207

Source: 1987 Census of Wholesale Trade, U.S. Department of Commerce, Bureau of the Census cines, rose about 3-1/2 percent, based on preliminary estimates.

Reflecting the sluggish pace of sales--last year's increase in total sales about matched the rise in goods prices, implying that real volume was unchanged--retail trade employment growth slowed to a standstill in 1990. On a year-end comparison, retail employment was up only 0.4 percent. The pattern of employment parallels trends seen in taxable sales. General merchandise and apparel stores as well as building supply outlets registered year-to-year declines in employment. Growth was less than 1 percent in the automotive sector and in food stores. Other retailing, dominated by eating and drinking places, managed a 1.6 percent increase across 1990.

The 1987 Census of Retail Trade identified 157,760 retail establishments. This is considerably fewer than the 277,000 outstanding retail sales tax permits for that year; however, substantial numbers of tax permits are issued to firms and individuals whose primary business is other than retailing. Sales in 1987 totaled $179.8 billion, in line with U.S. Commerce Department estimates of $184 billion. Total retail wages amounted to $22.7 billion or 12.6 percent of sales.

Sales per establishment averaged $1.1 million (Table V-5), but ranged from over $14 million for new and used car dealers to $200,000 for drinking places. Sales per employee averaged $89,000, against average retail wages of $11,200. Car dealers had the highest average sales per employee of over $300,000, while restaurants averaged only $26,000 per worker. Average wages ranged from a high of $28,000 at car dealers to less than $7,000 (plus tips) at eating and drinking places.

Trade Outlook. With the major uncertainty of the Persian Gulf war out of the way, consumer spending should gradually revive this year and gain strength in 1992. General merchandise and apparel stores should be among the first to see the pickup in sales. Building materials dealers will feel the gradual recovery in housing by summer. Furniture and appliance stores will benefit from the pickup in both new and existing home sales.

The outlook for car dealers is somewhat clouded by a potential overhang of low milage used cars sold new last year to daily rental fleets. Many in the industry believe that these cars are direct competition to the new car market. Although most are now retailed by new car dealers (rather than rental company outlets), prices are often several thousand less than new models. Thus, dollar sales and reported unit volume of new car dealers may remain sluggish for some months, even though "retail" activity may be improving.

The slump in new car sales over the last two years has added to underlying replacement demand, and by fall an upturn in new car volume should be underway.

Table V-5
Selected Statistics, California Retail Trade, 1987

Kind of business	*Number of Establishments*	*Sales ($ mill.)*	*Employment*	*Sales per*		*Wages per Employee*
				Establ.	*Employee*	
Total	157,760	$179,801.4	2,022,068	$1,139,715	$88,920	$11,242
Building materials and garden supplies	6,170	9,058.8	71,596	1,468,197	126,526	15,324
General merchandise	2,310	21,499.9	199,063	9,307,303	108,005	11,295
Food stores	19,200	36,494.9	287,648	1,900,777	126,874	14,368
Automotive dealers	9,856	38,893.6	158,055	3,946,184	246,076	24,094
Gas stations	9,812	10,742.3	71,074	1,094,810	151,142	9,206
Apparel and accessories	16,134	9,597.7	131,080	594,874	73,220	9,320
Furniture, homefurnishings	12,417	10,446.8	86,611	841,329	120,617	15,186
Eating and drinking	45,910	19,989.2	759,634	435,399	26,314	6,853
Drug and proprietary	4,462	7,319.5	59,311	1,640,418	123,410	15,070
Other	31,489	15,758.8	197,996	500,455	79,592	10,881

Source: 1987 Census of Retail Trade, U.S. Department of Commerce, Bureau of the Census

Wholesale volume often lags the upturn in retail trade by a few months as initial sales gains can often be supplied from inventory. On this occasion, however, retail inventories do not appear excessive, and wholesalers should participate in the upturn relatively quickly.

Initially, both wholesalers and retailers may be cautious in hiring additional workers, but prospects for the 1991 Holiday season are considerably better than last year's disappointing experience, and a more normal growth pattern in trade employment should be evident by late this year.

Transportation and Utilities

Only recently have employment figures provided any clue that the slowdown in the economy is affecting the transportation and utilities sector. This is not surprising, since the utilities are relatively unaffected by the business cycle. Incremental new "hook ups" often slow during a recession, but in terms of overall demand for utility services, the new business is relatively unimportant.

Average employment in 1990 grew 3.7 percent, to almost 630,000, and the gain outpaced 1989's 3.1 percent advance. However, on a year-end comparison, growth amounted to only 1.6 percent.

The slowdown across 1990 was concentrated in the communications utilities industry, where employment fell more than 4 percent. While the economic slowdown no doubt contributed to the decline, the more important element is probably the new regulatory environment which allows the telephone utilities to retain a portion of profit gains attributable to productivity improvements. Under the previous regulatory scheme, utilities were guaranteed a rate of return on invested capital, and there was little incentive to cut costs. Now, both customers and stockholders share in benefits arising from reduced costs.

In the transportation sector, there has been a modest slowing in the growth of trucking jobs in recent months, but December employment was still up 4-1/2 percent over the year. Changes in freight volumes are more closely associated with inventory movements than final sales. Because inventory liquidation has been relatively slight thus far, there has been little slowing in trucking employment. However, even though the inventory liquidation cycle is expected to remain mild, truckers may yet experience a few months of weaker activity in the first half of 1991.

Air transportation employment grew rapidly through the first nine months of last year, but slowed dramatically toward the end of the year. In 1989 and 1990, major carriers were adding large numbers of flights, especially on intrastate routes. However, even in the "Bay to Basin" corridor--the world's busiest by some measures--the market has become overcrowded, and flight cutbacks have been announced.

In addition, the outbreak of a shooting war in the Persian Gulf put a major damper on interstate and international travel while substantially boosting fuel costs. Most major airlines suffered losses in the latter part of 1990, providing further incentive to reduce less profitable flights. The end of the war may not bring instant recovery to the airlines industry. Lower fuel prices will certainly help reduce costs, but many believe that international travel--especially organized tours which require longer lead times--may suffer for most of the year. Businesses, faced with declining profits, have also cut travel budgets as is normal in a recession.

Outlook. Incremental demand for utility services will remain sluggish through most of this year. The expected upturn in housing activity will not affect utility demand until late in 1991. Transportation will probably weaken further through the first half of the year, reflecting the inventory cycle and announced cuts in airline schedules. Overall, however, no decline in employment is expected, only a period of slower growth. By 1992, the sector should return to more normal rates of growth.

Finance, Insurance and Real Estate

With some notable exceptions, the financial services industry continued to face difficult times in 1990. Growth in this sector, which employs almost 850,000, nearly halted in 1990, posting a scant 0.1 percent increase in jobs on a year end comparison. Depository institutions, including banks and savings and loans, experienced a rare annual decline in jobs last year. Several, mostly smaller, savings institutions were closed by regulators in 1990. In addition, loan volume at thrifts and--given capital constraints--the ability to make loans were diminished. With profits at some institutions under pressure from increased loan losses--arising in many cases from out of state lending activi-

Table V-6
Employment Growth in
Finance-Insurance-Real Estate
(In thousands)

	1990	*Percent change*
Total	840.4	0.9
Finance	406.7	0.9
Insurance	229.1	0.8
Real Estate	204.7	1.1

Source: California Department of Finance

ties--cost cutting efforts continued in 1990.

Partly reflecting regulatory activity, net new savings at California savings and loans declined by $19.3 billion, following a $20 billion drop in 1989. New mortgage lending dropped to $74 billion, off $7.5 billion from the previous year, which in turn was down $19 billion from the record 1988 volume. The decline in new mortgage loans reflected both a slower real estate market and the "downsizing" of the industry in the wake of the problems of the late 1980s. Even the strongest thrifts reported increased loan losses in the latter part of 1990, arising almost entirely from commercial and development lending.

Loan volume at California banks continued to grow last year, with total outstandings rising to $228 billion as of December 31. The 13 percent increase matched the previous year's gain. Real estate was again the only category to show any significant increase, rising 24 percent to $124 billion. Loans secured by real estate now account for over half of all outstanding credits at California banks. Commercial and industrial loans and loans to individuals each posted gains of less than 5 percent, while agricultural lending was unchanged on the year. Farm loans are down nearly 40 percent from peak levels reached in 1983.

The rapid growth in real estate lending reflects several factors. To some degree banks are filling the void left by the drop in thrift institution lending. Single family mortgages are attractive products because they carry a low weighting in the new capital ratio calculation. In addition, home equity credit is an increasingly popular substitute for traditional consumer lending, because interest on real estate secured loans remains tax deductible for most households and interest rates are generally lower than on conventional consumer credit. Many banks are seeking to reduce their exposure to construction finance, but slow residential sales and commercial leasing activity have in many cases delayed repayment of these loans.

Although California banks are generally in much better condition than many in the Southwest and Northeast, the high and rapidly growing proportion of real estate lending has attracted the attention of both regulators and investment analysts. Although local banks have had relatively good experience in the California market, it is doubtful that real estate lending will continue to grow a rates in excess of 20 percent annually. Fortunately, out-of-state lending is more likely to be scaled back than loans to California developers, but construction loans will nonetheless be more difficult to obtain in the months ahead.

Real estate employment declined moderately in 1990 and sales volumes decreased. The real estate market is discussed in more detail in the following chapter.

Outlook. The financial services sector is unlikely to provide much growth in 1991, but should pickup somewhat next year. Financial institutions will continue to emphasize the need to control costs, and there may be further consolidations in this industry. Although real estate markets should improve gradually this year, volume may not be sufficient to support the current sales and service workforce, and further reductions can be expected.

Insurance may grow modestly, but carriers (companies which write the policies as opposed to the agents who are their sales force) share some of the asset quality problems of depository institutions and face regulatory pressure on premium income. Hence, insurance carriers may also seek to reduce employment costs over the next year or two.

Overall, a familiar theme: sluggish growth, if any, in 1991, returning to a more normal pattern next year.

Travel and Tourism

The effects of travel and tourism cut across many segments of the economy, virtually all in the service producing sector, plus some derived demand in construction. As industries are traditionally defined, there is no "travel" industry, but clearly hotels, air and interurban transportation and a portion of retail trade must be considered travel related. Travel is important

Table V-7
California Travel Spending
($ millions)

	1988	1989
Total	44,080	48,480
Air transport	7,130	7,840
Travel arrangement	1,550	1,710
Destination spending:		
Total	35,400	38,930
Retail shopping	9,930	10,920
Restaurants	9,000	9,880
Lodging	6,730	7,400
Entertainment	4,170	4,590
Ground transport	2,990	3,320
Food stores	2,580	2,820

Source: California Dept. of Commerce

to California, and indeed the state is probably the favorite destination of foreign visitors, and usually quite high on the list of domestic travelers as well.

Yet, reflecting California's diversity, travel is only marginally more important to the state's economy than it is in other parts of the nation. For example, California accounts for 12.3 percent of the nation's hotel and motel employment, compared to the state's 11.7 percent share of all nonfarm jobs. Thus, California probably has only a small travel "surplus" with the rest of the nation (and no doubt the world).

The California Department of Commerce estimates that in 1989 total travel-related spending in the state amounted to $48.5 billion, and directly or indirectly supported 727,000 jobs. It should be pointed out that Californians themselves account for a significant portion of travel spending. However, to the extent that Californians spend their vacation or business travel money "at home" rather than in some other state or nation, intrastate travel is certainly a plus for the state's economy. Moreover, in some regions of the state--the mountains, central coast and San Francisco, are examples--travel spending, whether generated from within or outside the state, is a vital part of the local economy.

Outlook. The travel industry has encountered some turbulence over the last year or more, and the bumpy ride may not be quite over. The Loma Prieta earthquake resulted in a substantial downturn in Bay Area and Central Coast visitor traffic in late 1989 and early 1990. Travelers returned by mid-year, however often at the cost of discounted air and hotel packages, usually not necessary at the peak summer vacation season. While visitor volume returned to pre-quake levels, hotel occupancy rates were generally down 1 to 3 percentage points across the state, reflecting an expanded supply of available rooms.

The national recession began to cut into business and vacation travel spending late last year, and the Persian Gulf war had an instant and substantial impact on foreign visitor traffic in January and February. With the end of the war, the concern now is that, given lead times required to organize tour packages, discounting may once again be a feature of this summer's peak travel season. Meanwhile, many businesses have cut 1991 travel budgets in the face of disappointing profits and sales associated with the recession.

There are some positive elements, however. The dollar's exchange rate makes travel to the U.S. an almost irresistible bargain for European and Japanese tourists. At current exchange rates, first class hotel rooms in San Francisco or Los Angeles are half to two-thirds less than those offered in London, Paris or Tokyo. Nor is this price differential lost on most Americans, who are staying home in droves--not so much out of fear of terrorism, but of the prices encountered overseas.

Factoring in the weakness in business travel, which is likely to linger through much of the year, 1991 may at best be a repeat of last year: a return of visitor traffic by summer, but at discounted prices and probably not in sufficient quantity to fill the still growing number of hotel rooms. Barring further unusual circumstances, 1992 should see an upturn in business travel and a more normal pattern of foreign and domestic visitor traffic. Nonetheless, the hotel building boom of the late 1980s will probably result in hotel occupancy rates which are still less than the industry's desired levels.

Government

Federal, state and local government comprise the third largest employment sector in California, with employment of 2.1 million about equalling manufacturing.

Reflecting budget constraints, Federal government employment has been on a downward trend for the last two years, interrupted briefly last spring by the temporary hiring of Census workers. State and local employment, in contrast, has continued to grow at a 3 percent (State) to 4 percent (local) pace, in large measure reflecting population-related pressures.

Budget realities will no doubt affect state and local employment trends later this year and in 1992, resulting in a slowing of employment growth. With weaker private employment and income growth, there are not enough funds available to continue to expand government at the recent pace. The difficult budget deliberations which will dominate the State Capitol in May and June will be repeated by county supervisors, city councils and school boards across the state this summer.

Services Summary

From this review of each of the service producing sectors, a fairly clear and consistent pattern emerges: sluggish growth with some scattered declines in employment will continue through the early months of 1991, followed by a pickup in some industries during the second half. By 1992, most private service activities will be returning to a more normal pattern of growth. Federal government employment will probably continue to decline modestly and State and local governments still face a slowdown during the second half of this year and early 1992.

VI. PERSPECTIVE ON REAL ESTATE AND CONSTRUCTION

Perhaps no segment of California's economy has attracted more attention over the past year than real estate. Weakness in home prices and sales and an oversupply of commercial office space and hotel rooms in many areas of the state have encouraged some analysts to draw parallels between California's markets and those of the Southwest, New England and portions of the Mid-Atlantic region. Those areas have, at various times in the last five years, witnessed significant drops in real estate values, and massive oversupply of office space and housing.

Is California the nation's next real estate disaster? The short and simple answer is "no", for a variety of reasons ranging from the diversity of the state's economy to the continued migration into the state, to the increasing importance of local growth control measures which make it very difficult to produce the massive residential overbuilding which characterized other markets, especially those in the Southwest.

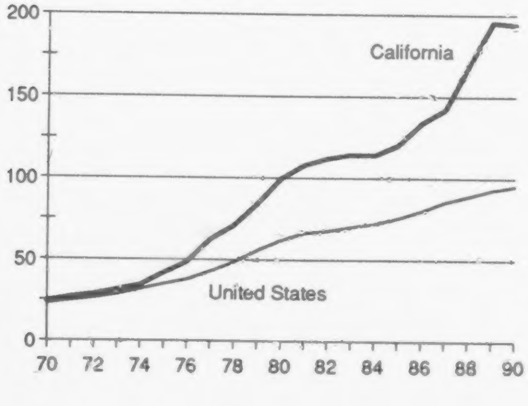
At the same time, it is useful to understand that California markets do indeed share problems in common with much of the rest of the nation. These include an historically large supply of office and hotel space, a dramatic shift in demographic forces which shape demand for both residential and nonresidential structures and a significant reduction in long term price inflation expectations which are magnified in markets for long lived fixed assets such as real estate. In addition, California includes some of the highest priced housing markets in the nation, and the inability of average income households to afford home ownership in the large coastal metropolitan regions remains a major concern to public policy makers and private sector interests as well.

It is probably fair to say that, compared to the last thirty years, real estate markets in California (and the nation) have entered a new phase in the 1990s. The longer run forces shaping real estate and construction include the gradual but nonetheless powerful shift in the age composition of the population and the reduction of inflationary expectations.

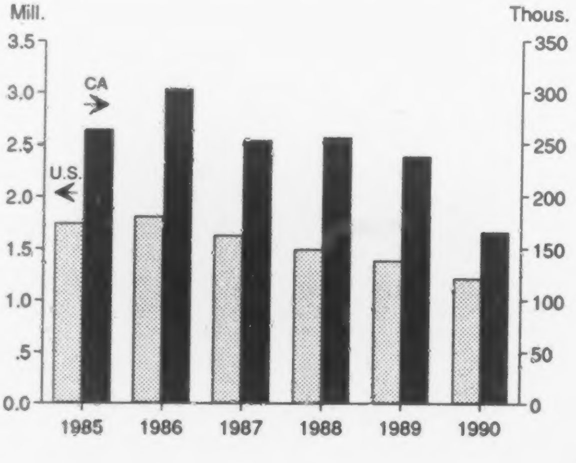
Commercial Real Estate Markets

California shares with most of the rest of the nation a long term oversupply of commercial structures, mainly offices but also hotels and in some areas retail space.

Median Sales Price
Existing Single Family Homes
($ thousands)



Housing: California and United States



In most markets, office vacancy rates are in the high teens, compared to more normal rates in the 6 to 8 percent range. Although most California markets are moving toward better balance--due in part to recent sharp declines in new construction activity--progress in reducing excess supply has been slow, and is now being further impeded by the recession. Although Federal tax laws and normal developer optimism provide some of the explanation for the current situation, it is also clear that today's markets are fundamentally changed from those of the past quarter century.

Demographic forces shape the demand for both housing and commercial office space. The sharp reduction in the birth rate, which began in the early 1960s and reached bottom in the mid-1970s, is now being felt in a significant slowdown in the growth of the civilian labor force. Not only is there a dwindling supply of young people reaching working age--civilian population aged 16 and over grew only 0.9 percent nationally during 1990--but also the massive upward shift of labor force participation among women has just about run its course.

Over the last 20 years, women's labor force participation has increased from 43 to 58 percent, and for the key 25 to 44 age group is now in the 75 to 78 percent range. As the current generation ages, there is some potential for higher participation rates among women aged 45 and over, but the continuing trend toward early retirement is expected mostly offset this effect over the next several years.

Table VI-1
Vacancy Rates for Office Buildings
(As of December)

	1986	*1987*	*1988*	*1989*	*1990*
United States average	21.5	20.7	19.7	20.0	19.5
Downtown	16.4	16.3	16.2	16.7	17.1
Suburban	23.8	22.8	21.5	21.4	20.4
Los Angeles	17.3	16.8	15.4	15.9	17.9
Downtown	15.0	13.2	13.5	13.4	15.8
Suburban	17.3	17.7	15.9	16.4	18.4
Orange County	23.3	21.3	22.5	21.9	20.7
San Diego	23.6	23.0	21.2	21.5	19.5
Downtown	17.0	12.8	10.1	16.0	13.1
Suburban	27.3	27.7	23.8	23.0	21.3
Ventura County	n.a.	18.5	15.0	18.7	27.1
Bakersfield	n.a.	n.a.	n.a.	27.2	21.5
Downtown	n.a.	n.a.	n.a.	29.5	29.7
Suburban	n.a.	n.a.	n.a.	26.2	17.6
Fresno	n.a.	n.a.	n.a.	16.9	18.2
Downtown	n.a.	n.a.	n.a.	21.9	33.5
Suburban	n.a.	n.a.	n.a.	14.9	12.4
San Francisco	19.4	16.3	15.3	14.5	13.9
Downtown	18.1	13.8	13.2	13.6	11.5
Suburban	21.4	19.7	18.4	15.7	17.3
Oakland-East Bay	28.3	25.0	22.4	18.5	17.6
Downtown	19.1	16.6	18.7	10.3	16.8
Suburban	31.4	27.6	23.4	20.7	17.8
San Jose	26.6	24.9	16.8	14.6	12.1
Downtown	18.9	26.1	20.1	20.2	17.2
Suburban	28.2	24.6	15.9	13.0	10.4
Sacramento	21.3	19.6	15.4	18.8	13.3
Downtown	11.3	12.6	5.7	12.8	5.6
Suburban	24.8	22.0	18.4	20.7	15.9

n.a. Not available
Source: Coldwell Banker Commercial

Even in an economy which continues to shift labor resources from the production of goods to the provision of services, the halving of labor force growth since the early 1980s is bound to affect the demand for commercial office space, business oriented hotels and retail shopping space. Prospects for commercial developments are almost always judged based on historical demand trends. Even though the prospective slowdown in the working age population was well known to demographers and economists, developers and lenders apparently continued to evaluate the viability of projects based on past market absorption of office space.

There was ample reason for the 1980s commercial building boom. Office, retail and hotel markets were undersupplied in the early 1980s--office vacancy rates in the 2 to 3 percent range were common in 1980. Also, from 1981 to 1986, generous Federal tax depreciation incentives were available to real estate investors. Finally, the long lead times between planning, construction and completion, coupled with the contemporaneous recognition among developers, lenders and investors of market and tax opportunities, virtually guaranteed that commercial markets would eventually be oversupplied.

The recession has exacerbated the situation, with space demand slowing in most parts of the country, and several areas actually experiencing "negative absorption"--net reductions in occupied space. CB Commercial notes that the current recession is hitting white collar industries such as finance especially hard, and that downtown areas--rather than suburbs--are feeling the brunt of the reduction in space demand.

The swing from scarcity to excess is quite normal in the commercial development cycle. The difference now is that slow labor force growth will probably double the time necessary to work off the oversupply of space, as compared to, say, the cyclical experience of the mid-1970s to early 1980s. For example, given the current national average office vacancy rate of around 20 percent, most observers believe it will be five to ten years before markets return to a more normal 6 to 8 percent vacancy factor, even assuming that commercial construction activity remains near the current low ebb.

A second key difference between the current situation and those of the last 20 years is the perception of future inflation. Since 1970, inflation has been developers' and lenders' best friend, papering over many of the excesses and failures of past real estate cycles. The virtually certain "knowledge" that even a mediocre office, retail or hotel project would always fetch more in tomorrow's market allowed lenders to capitalize overdue interest and principal payments, on the basis of enhanced appraisal values. Developers' balance sheets were also enhanced in a similar fashion.

This change in inflationary expectations, as much as any regulatory factors, has altered lenders' and investors' attitudes toward real estate development, sharply increasing the perceived risk. Lower prospective inflation is in part related to the reduced growth of demand as well as the success of policy over the last decade in containing the overall rise in prices.

Assets such as real estate, for which supply is relatively fixed in the short run, usually benefit from rising inflation and inflation expectations, since asset price movements reflect not only the current experience, but also the ability of owners to defend against future price increases. In an inflationary environment, buyers and investors are willing to pay a premium for this future protection--and the prospect of further gains when the asset is later resold. When inflation rates are low, and expected to remain low, the "inflation premium" is largely removed from asset prices.

California Commercial Markets. For the most part, California markets are marginally better than the national average. CB Commercial reports that vacancies in the two largest markets--Los Angeles and San Francisco--are running two to five percentage points below the U.S. average. Suburban San Jose and downtown San Diego are running considerably lower than the U.S. figure, and downtown Sacramento continues to have one of the two or three lowest vacancy rates in the entire country. Relatively small markets, including downtown Fresno and Bakersfield and suburban Ventura County are the only areas notably above the U.S. average.

However, downtown Los Angeles has been experiencing a recent building boom, and although many of the new offices are leased, market observers expect vacancy rates in existing structures to rise sharply as tenants move into their new quarters later this year and in 1992. Some believe the vacancy factor could approach 30 percent by next year.

San Francisco, by contrast, adopted a strict annual quota on new office space construction in the mid-1980s. A large volume of permits were taken out prior to the public vote on the quota, and completions of these temporarily boosted the city's vacancy rate in 1988-89. More recently, the lack of new supply--even in a slack market--has sent vacancy rates down and rents edging up. The betting is that the 750,000 square foot annual quota--sufficient to accommodate 3,000 to 4,000 workers--will fall far short of demand in

Table VI-2
Nonresidential Construction Activity
By Type of Project
($ millions)

	1989	*Percent Change*	*1990*	*Percent Change*
Commercial	$6,159	-6.2	$5,245	-14.8
Office buildings	2,820	2.6	1,920	-31.9
Stores/Mercantile	2,057	-10.9	2,033	-1.2
Hotel/Motel	560	-16.6	437	-21.8
Amuse/Recreation	193	-11.0	225	16.9
Parking garages	451	-19.5	537	19.2
Service stations	79	25.5	92	17.0
Industrial	1,705	-5.4	1,598	-6.2
Other	1,518	-14.2	1,635	7.7
Alts/Additions	4,284	6.5	4,235	-1.1
Total nonresidential	13,666	-3.5	12,713	-7.0

Source: Construction Industry Research Board

Table VI-3
Nonresidential Building Permit Value
California Metropolitan Areas, 1990
($ millions)

Area (County)	*1990*	*Percent change*
Los Angeles (Los Angeles)	$3,805.2	-15.2
Riverside-San Bernardino (a)	1,331.6	-7.4
Anaheim (Orange)	1,173.0	-23.4
San Diego (San Diego)	958.2	-22.4
Oakland (Alameda, Contra Costa)	921.2	14.5
San Jose (Santa Clara)	757.5	0.1
Sacramento (b)	743.2	11.9
San Francisco (c)	733.6	5.4
Fresno (Fresno)	240.8	27.9
Oxnard (Ventura)	236.0	-4.1
Stockton (San Joaquin)	221.5	44.7
Bakersfield (Kern)	205.2	12.5
Vallejo (Napa, Solano)	164.5	-18.1
Santa Barbara (Santa Barbara)	155.0	36.2
Modesto (Stanislaus)	126.8	5.7
Visalia (Tulare)	120.0	36.8
Santa Rosa (Sonoma)	115.5	6.1
Salinas (Monterey)	95.9	17.8
Redding (Shasta)	72.8	19.0
Yuba City (Sutter, Yuba)	50.5	-1.0
Chico (Butte)	48.7	16.8
Santa Cruz (Santa Cruz)	44.5	-42.3
Merced (Merced)	32.9	-20.7
Remainder of state	359.5	19.4
Total	12,713.3	-7.0

(a) Riverside, San Bernardino (b) El Dorado, Placer, Sacramento, Yolo (c) Marin, San Francisco, San Mateo
Source: Construction Industry Research Board

the years ahead. Of course, rising rents will direct future growth to neighboring Oakland and more distant suburban reaches of the Bay Area.

With vacancy rates generally lower than the national average and the prospect that employment growth, while slower than in the 1970s and 1980s, will remain above the U.S. experience, California's commercial markets appear to be in better balance than most. The commercial construction slump will no doubt continue long after the recession is over, as lenders and investors will remain understandably reluctant to commit to new projects as long as vacancy rates are above the optimum 6 to 8 percent level.

The potentially high downtown Los Angeles vacancy factor is less serious than it appears. As the center of the nation's second largest metropolitan region, downtown Los Angeles draws on a massive and diverse market, which should help fill the available space once the recovery is underway.

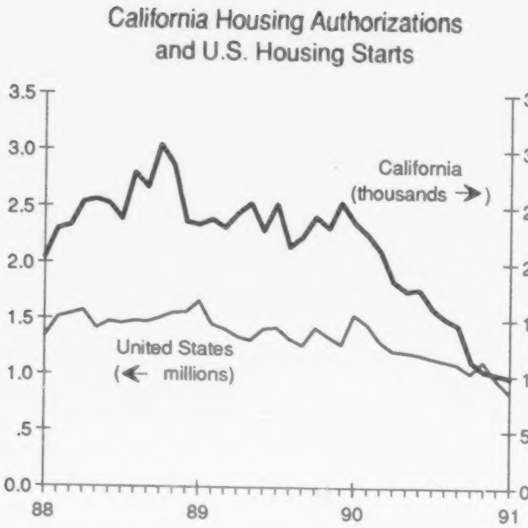
California's above average employment growth should help bring office vacancy rates back to a normal level by the mid-1990s, suggesting that the slump in office construction will be over in the state two to five years sooner than in most other areas. Even now, demand remains strong in some areas such as Sacramento and suburban San Jose.

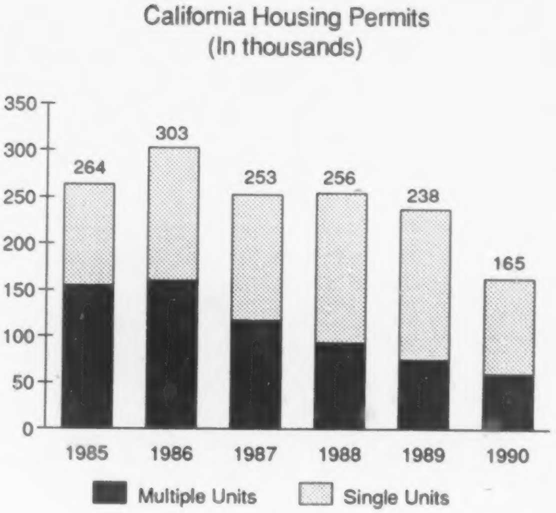
Credit Considerations. Financing commercial projects will continue to be difficult, but the commercial real estate "credit crunch" should not be viewed as a permanent or long term impediment to the market. As noted, lenders and investors have clearly turned more cautious in their attitudes toward real estate finance. Many have suffered losses and face regulatory pressure to cut back on construction finance if for no other reason than to diversify their portfolios. Lenders also face the necessity of increasing their capital to asset ratios, which is causing a general pull back in most kinds of commercial lending. But the higher capital requirements are a one time shift. Once capital reaches the higher level--well before the end-1992 deadline in most cases--lenders will again actively seek profitable new business.

Even though several California lenders have suffered real estate losses, most of the trouble has been in out-of-state credits. Successful lenders, by sticking close to the home market they know best, have largely avoided the painful experience of those who ventured into the Southwestern states. Moreover, the overbuilding in downtown Los Angeles has been financed mainly by foreign and nonbank lenders.

This suggests that once vacancy rates return to more normal levels and lenders are again in an expansion phase, California real estate should be in a favorable position to compete for new funds. In the absence of rapid inflation, developers will no doubt be required to increase their equity position in new projects, but funds should be available for sound projects in California sooner than in most areas of the nation.

Clearly, California cannot be compared to Texas, Colorado or Arizona in the 1980s or New England today. Job growth prospects are far better than those in the Northeast, and the state has avoided by a wide





margin the massive excesses of the less diversified Southwestern states.

Residential Markets

Last year saw steep declines in both new housing construction and sales of existing homes in California. Housing units authorized by building permits declined 31 percent to 164,400 in 1990, breaking a six year string of production in excess of 200,000 units. Over the course of the year, the decline was even more dramatic, falling from a quarter million annual pace in January to less than 100,000 in December.

The decline in resale activity was less pronounced last year, off 17 percent to 447,000 units, but the drop had been underway since early 1989 when sales peaked at better than a 600,000 unit annual rate.

This has been an unusual housing cycle, at least compared to those of the last 30 years. Since the 1960s, and arguably throughout the post World War II era, major shifts in the pace of homebuilding and sales could always be traced to movements in interest rates. Prior to deposit deregulation of the early 1980s, the source of funds to savings and loans and banks was effectively cut off whenever interest rates rose above a certain level, and the flow of mortgage money was disrupted; in short, a credit crunch. Once deposit interest rate ceilings were removed, high interest rates simply resulted in most potential buyers being priced out of the market.

This housing slump, which began nationally in 1987 and quite suddenly last year in California, has been affected only marginally by movements in interest rates. Compared to the roller coaster ride of the mid-1970s and early 1980s, mortgage interest rates have been relatively stable over the last five to six years, ranging from a low of near 9 percent during 1986, to no more than 10-1/2 percent at various times since then.

The 9 percent rates of 1986 were associated with the peak of the housing cycle, both nationally and in California. Interest rate movements since then, however, would not seem sufficient to explain the deep slump in building and sales. For example, until late 1990, the last time building permit volume in California dipped below a 100,000 unit pace mortgage interest rates were in the high teens. Indeed, during the second half of last year, when sales and building volume were reaching eight year lows both nationally and in California, mortgage interest rates were declining to near the 1986 lows.

Credit Crunch? In the current situation, there have been some elements of a credit crunch, in the sense that lenders have turned cautious with respect to construction finance, and the capacity to lend has been restricted by both new capital requirements for banks and savings institutions, and by the industry consolidation following the rash of S&L failures. But for the most part, the failed thrifts were making little if any contribution to the California housing market. Some invested mainly in high yield or "junk" bonds, others in commercial developments and many were largely out of state lenders. However, some failing institutions had hoped to grow out their problems and were probably making more risky loans at more favorable terms than sound credit policy would ordinarily allow.

In any case, the cutbacks in construction financing did not begin on a widespread basis until after home sales had begun to soften and there were concerns over scattered pockets of excessive inventories of unsold homes. In addition, there has been no shortage of mortgage credit to facilitate sales (as opposed to construction financing).

Mortgages are attractive for banks and savings institutions, because they require only half as much capital as other types of loans under the new risk weighted capital scheme. Moreover, mortgages are readily salable into the nation's well developed secondary mortgage market and are thus a potential source of liquidity to depository institutions. Mortgage bankers, who act as intermediaries between individual borrowers and the secondary markets, are a growing source of housing credit, more than compensating for the consolidation in the thrift industry.

Hence, while there may be grounds for believing that the credit crunch could impede the recovery in homebuilding if traditional lenders remain cautious, credit conditions provide an unsatisfactory explanation for the slowdown in new and existing home sales. It appears that more fundamental demand forces may be at work.

Table VI-4
Characteristics of New Homes Completed
Western U.S., 1985 and 1989

	1985	*1989*	*Percent change*
Average square footage	1,770	2,065	17
Percentage with:			
Four or more bedrooms	21	34	13
2-1/2 or more bathrooms	31	48	17
Central air conditioning	49	64	15
Fireplaces	65	80	15
New homes sold:			
Average price	$111,800	$173,900	56
Average price per sq. ft.	$47.10	$58.30	24

Source: U.S. Bureau of the Census

Longer Term Forces. Many of the same elements which affect commercial real estate markets are also at work in the residential sector. Slower growth in the adult population affects the overall demand for housing. Initially, this slowdown was felt in the apartment market, where young adults are the major source of demand. In the late 1980s, there was an absolute decline in the number of 20 to 30 year olds nationally, and essentially no growth in California. Hence the flow into the rental market was sharply curtailed.

In addition, apartments, like office buildings and hotels, were favored by Federal tax laws in the early 1980s, but were less kindly treated in the 1986 tax reform legislation. Hence, tax policy tended to exaggerate the apartment building cycle. In California, multifamily construction fell from a peak of 168,000 units in 1986--the last year before tax reform--to only 60,000 units last year.

While it may be convenient to blame tax reform for the apartment sector's problems, the fact that vacancy rates have declined only slowly in the face of sharply contracting new supply underscores the weakness of underlying demand. Had the tax breaks been continued, the oversupply of apartments would certainly have been far greater, and would have posed even more financial problems for developers, investors and lenders.

Many builders understood the shift in housing demographics and sought to aim their product at an older "move up" market of second or third time homebuyers. Most of these have large equity positions in an existing home, and tax incentives to reinvest in a principal residence rather than recognize a capital gain on the sale of their homes.

Reflecting this market shift, new homes got progressively larger, and featured more and more amenities in the late 1980s. As Table VI-4 indicates, the average size of a single family home completed in the Western U.S. in 1989 was 2,065 square feet, up more than 17 percent from the 1,770 figure in 1985. Likewise, a larger proportion of 1989 houses had fireplaces, three bathrooms, four bedrooms and central air conditioning than was the case in 1985.

However, the move up market depends importantly on the ability of homeowners to sell their existing houses at prices high enough to afford the new homes. This process was facilitated and encouraged by the spike in resale prices which occurred from late 1987 through mid-1989. But once the existing market flattened out, so did the demand for luxury new homes.

By 1989, the market for existing homes was beginning to feel the effects of demographic change which had already affected apartments. The crest of the baby boom wave turned 30 in 1988, and growth in the key 30 to 40 age group thus began to slow. The mid-1980s had seen substantial net migration to California from other states, reflecting difficult economic conditions in the Southwest. As the Southwestern economies recovered toward the end of the decade, net domestic migration to California slowed to virtually nil in the second half of 1990.

Thus, the flow into the California housing market slowed, and price appreciation came to a sudden halt, even moving into reverse in some areas of the state. The 1988-89 price spike is itself difficult to explain on demographic grounds alone. A second element in home price behavior is investment demand.

The demonstrated investment returns to homeownership probably encouraged additional buyers to come into the market, fearing that an opportunity was being missed. Eventually, sellers were also enticed by the higher prices and supply and demand came back into balance. Now, the recession has tipped the market toward oversupply. Although population growth may create housing "needs", job growth creates effective demand. As employment gains declined from 4 percent in 1989 to 2.4 percent last year (and to less than 1 percent more recently), so has the demand for housing.

In addition, recessions are usually associated with a drop in new household formation. This year, some demographers predict that nationally the combination of the age structure of the population and the downturn in the economy may result in the first drop in net household formation since World War II. The situation is probably not that severe in California, but neither is there booming underlying demand for housing at present.

Longer term, housing markets will reflect the slower pace of growth in the adult population as well as the overall reduction in the rate of inflation. Expected future inflation is capitalized in home prices in the same way as in commercial real estate markets. If inflation is low, the incentive to "lock in" housing costs will be less, and the prospective investment profit when reselling the house is also reduced. These factors influence the price of houses, and point to relatively low price appreciation in future years.

The Affordability Question. The ability of average income Californians to afford homeownership has been a topic of concern since the late 1970s. According to the National and California Associations of *Realtors,* in 1974 California housing was quite affordable. The median home price of $34,700 was 8 percent higher than the nation, but household incomes were nearly 15 percent more than the U.S. average. By 1980, following several years of double digit price increases, California home prices had trebled to $100,000, some 60 percent more than the national average. In the 1980s, California price appreciation averaged only 6-1/2 percent a year, but the gap against the rest of the nation widened to more than 100 percent. Incomes, meanwhile, remained no more than 15 percent above the U.S. average.

The affordability problem is concentrated mainly in the coastal regions, which hold about two-thirds of the state's population. Home prices in the Los Angeles,

Table VI-5
Median Existing Home Sales Price

Region	*December 1990*	*Percent change 1989-90*
California	$192,930	2.5
Santa Clara	254,720	-6.5
San Francisco	245,850	-4.4
Ventura	234,310	-4.5
Monterey	232,140	-0.1
Santa Barbara	229,550	-10.8
Orange County	229,120	-6.5
Los Angeles	216,430	2.2
San Diego	181,720	-1.9
Northern Wine Country	171,400	0.5
Northern California	143,700	11.4
Sacramento	133,950	8.8
Riverside/San Bernardino	132,410	5.5
Palm Springs/Lower Desert	113,330	-0.8
High Desert	105,520	4.7
Central Valley	105,250	0.2

Source: California Association of Realtors

Table VI-6
Housing Expenditures - US and California - 1987

	U.S. Average		California Coastal Areas* Average		
	Amount	*% of Tot.*	*Amount*	*% of Tot.*	*% US Avg*
Income before tax	27,326	-	33,799	-	123.7
Income after tax	24,871	-	30,410	-	122.3
Persons per household	2.6	-	2.6	-	100.8
Housing tenure:					
Homeowner w/ mortgage	38%	-	41%	-	107.4
Homeowner w/o mortgage	25%	-	13%	-	53.7
Renter	38%	-	46%	-	120.5
Average total expenditure	24,414	100.0	29,222	100.0	119.7
Housing	7,569	31.0	10,258	35.1	135.5
Shelter	4,154	17.0	6,676	22.8	160.7
Owned Dwelling	2,375	9.7	3,665	12.5	154.3
Mortgage interest	1,461	6.0	2,613	8.9	178.9
Property tax	464	1.9	496	1.7	10[illegible].9
Maintenance, ins., other	449	1.8	554	1.9	123.5
Rented dwelling	1,345	5.5	2,483	8.5	184.6
Lodging away from home	434	1.8	528	1.8	121.6
Utilities	1,671	6.8	1,358	4.6	81.3
Operations, supplies, furnishing	1,744	7.1	2,224	7.6	127.5
Homeowers only:					
Owned dwelling	3,770	-	6,772	-	179.6
Property tax	737	-	917	-	124.6
Maintenance, ins., other	713	-	1,025	-	143.8
With mortgage only:					
Mortgage interest	5,844	-	19,707	-	337.2
Renters only:					
Rented dwelling	3,539	-	5,422	-	153.2
Nonhousing expenses	14,671	60.1	16,256	55.6	110.8
Food and beverage	3,953	16.2	4,430	15.2	112.1
Apparel	1,446	5.9	1,[illegible]6	5.7	115.2
Transportation	4,600	18.8	5,158	17.7	112.1
Health care	1,135	4.6	1,041	3.6	91.7
Entertainment	1,193	4.9	1,389	4.8	116.5
All other	2,344	9.6	2,571	8.8	109.7

* Weighted average of Los Angeles and San Francisco CMSAs and San Diego PMSA
Source: [illegible].S. Department of Labor, Bureau of Labor Statistics

San Francisco, San Jose and Orange County areas average in the quarter million dollar range. Inland, in the Riverside, San Bernardino and Sacramento areas, prices of around $130,000 are about a third higher than the U.S. average. Much of this difference can be explained by quality differences related to the young age of the housing stock in these rapidly growing areas of the state. Other areas, including Fresno, Bakersfield and Modesto have relatively new housing stocks and prices which average less than the nation's $95,000 median.

The are a number of explanations for California's high housing costs. The most powerful of these simply relates to economic competition for a fixed resource, namely land. (Construction costs in California are no higher, and in most cases probably lower, than in other areas of the country). Economists at the Federal Reserve Bank of San Francisco point out that housing costs are related to the economic productivity of the land in urban areas. Thus, housing costs are high in Tokyo, London, and New York, as well as in Los Angeles and San Francisco. But in none of these areas are housing costs out of line with economic output per acre of usable land. Like residents of the

Bay Area and Los Angeles, workers in London, Tokyo and New York suffer long commutes from distant suburbs where housing is less costly, or live in apartments or smaller housing units closer to job centers.

There may be some elements, such as zoning regulations or growth controls, which add to housing costs. But London surrounds itself with a vast greenbelt, Japan severely limits urbanization of close in farmlands and New York suburbs jealously guard their estate sized lots. Zoning, growth controls and NIMBY (not in my back yard) are by no means unique to California.

Proposition 13 may contribute to higher housing costs in California. The low and relatively fixed property tax is capitalized into house prices. Potential sellers may be reluctant to give up low property taxes based on market values of up to 15 years ago (appreciated by 2 percent per year), and local governments find it necessary to boost building permit fees to finance local infrastructure improvements, thus increasing the cost of new housing.

On the other hand, California housing may be of somewhat better quality than the national average. This reflects not only the younger age of the housing stock, but also the tendency to make improvements to a rapidly appreciating asset. For many California homeowners, additions and remodeling can made far more economic sense than purchasing another house. In any case, the net effects of Proposition 13 and a possibly higher quality housing stock can only explain a fraction of the difference in home prices.

If land use competition is the major cause of high housing costs, what are the implications for the state's economy? Rapid growth of the more affordable inland areas provides the major answer. In the short run, this implies much longer commutes, but after a few years, jobs usually follow the growth in population as firms seek a quality workforce at wages they are able to pay. This was certainly the pattern in Orange County in the 1960s and in the inland areas of Alameda and Contra Costa counties more recently. Now, this pattern of job growth is beginning to take shape in Riverside and San Bernardino counties near Los Angeles and in Solano County and the Sacramento area in northern California.

Within the coastal areas, economic patterns have evolved to accommodate the high cost of housing. The 1987 Consumer Expenditure Survey from the U.S. Department of Labor reveals that average household incomes in the Los Angeles, San Francisco and San Diego areas are nearly 24 percent above the national level. A much higher proportion of coastal Californians are renters--46 percent vs. 38 percent for all U.S. urban areas. Housing costs consume 35 percent of this higher income, compared to 31 percent nationally. The larger proportion of renters in California helps lower the overall average cost of housing. Lower utility costs--mainly reflecting milder weather in California--also help.

But for the more than 40 percent of coastal California households who are mortgage paying homeowners, housing is very expensive indeed. For these homeowners, mortgage interest payments average nearly $20,000 annually, more than three times the national average of less than $6,000 for homeowners with mortgages. This is enough to support a $200,000 mortgage at a 10 percent interest rate. When principal, tax and insurance payments are added, this implies that household incomes of mortgage paying homeowners averaged at least $75,000 in 1987, given that most mortgage loans are qualified at a basic housing cost to income ratio of less than 30 percent.

These expenditure data suggest that household incomes of coastal Californians who have mortgages must be least twice the areas' average of $33,800. Because some of these are long time homeowners, with relatively small mortgages, the expenditure data are roughly consistent with the California Association of *Realtors'* affordability data which suggest that only 20 percent or fewer of households in these areas can qualify to purchase a median priced home.

For the most part, housing costs in the coastal regions of California are reflections of these regions' economic success. Buyers will not--cannot--pay for housing they are unable to afford. Wages and other incomes in these areas are demonstrably high enough to support the home prices obtained in the market. Expanding the supply of housing is the best means to provide more housing at lower prices. Less stringent zoning laws and growth controls may help in some cases, but these regulations are usually adopted in response to popular pressure, which is difficult, and in a democracy, improper, for local governments to resist. Faster approval of large scale projects will help reduce the developer's interest expense of holding raw land. Mainly, however, the high cost of housing reflects the limited supply of land in areas close to centers of employment.

The fact that California built more houses in the latter half of the 1980s than in any other similar time period in the state's history belies the notion that housing supply is somehow restricted. The strongest housing markets are in the more affordable areas, reflecting both the abundant supply of land and the potentially larger market of households who are able to buy or rent the units. This fact is underscored by the pattern of activity during the 1990 housing downturn. As Table VI-7 shows, areas such as Bakersfield, Redding, Visalia and Yuba City managed gains in homebuilding activity, in sharp contrast to the pattern in most other areas of the state. Housing prices in these areas are among the lowest in the state.

No Collapse in Prices. Some analysts, mainly from outside the state, suggest that California's high housing prices represent a fundamental economic imbalance, and that sooner or later home prices will suffer a major setback. This analysis denies or ignores the competitive nature of land use markets. It is true that some individual houses in some areas purchased near the end of the 1988-89 spike would probably fetch less in today's market. But this does not imply any widespread reduction in home prices; rather it reflects a small number of houses that changed hands at prices which could not ultimately be supported by underlying market fundamentals.

Widespread declines in housing prices are almost always associated with a substantial oversupply of available units. This is demonstrably not the case in California's coastal metropolitan areas. Vacancy rates in the highest priced counties--Los Angeles, Orange,

Table VI-7
Permits Issued for New Housing Units
California Metropolitan Areas, 1990

	Single Family Unit		*Multi-family Units*		*Total Housing Units*	
Area (County)	*Number*	*Percent change*	*Number*	*Percent change*	*Number*	*Percent change*
Riverside-San Bernardino (a)	23,412	-38.8	5,439	-26.4	28,851	-36.8
Los Angeles (Los Angeles)	8,854	-62.8	16,190	-34.0	25,044	-48.2
Sacramento (b)	13,735	-17.4	2,932	-30.1	16,667	-20.0
San Diego (San Diego)	6,601	-39.2	9,217	17.4	15,818	-15.5
Anaheim (Orange)	3,420	-57.4	8,556	-0.6	11,976	-28.0
Oakland (Alameda, Contra Costa)	4,760	-44.2	2,523	-51.2	7,283	-46.8
Fresno (Fresno)	3,864	-20.0	1,489	-34.5	5,353	-24.6
San Jose (Santa Clara)	1,676	-34.2	3,628	57.0	5,304	9.2
Bakersfield (Kern)	4,559	16.4	397	3.1	4,956	15.2
Modesto (Stanislaus)	3,458	-32.5	493	-58.7	3,951	-37.5
Santa Rosa (Sonoma)	2,641	-27.8	997	15.8	3,638	-19.5
Stockton (San Joaquin)	2,959	-23.4	229	-27.3	3,188	-23.7
Vallejo (Napa, Solano)	2,415	-61.6	606	-33.8	3,021	-58.0
San Francisco (c)	1,166	-44.9	1,564	-51.5	2,730	-48.9
Oxnard (Ventura)	1,368	-59.1	1,252	-25.4	2,620	-47.9
Redding (Shasta)	1,840	38.1	513	80.6	2,353	45.6
Visalia (Tulare)	1,893	23.5	240	-49.6	2,133	6.2
Chico (Butte)	1,153	-22.1	759	62.2	1,912	-1.9
Yuba City (Sutter, Yuba)	1,092	55.8	331	109.5	1,423	65.7
Salinas (Monterey)	1,032	-43.1	358	-13.9	1,390	-37.7
Santa Barbara (Santa Barbara)	873	-37.0	397	156.1	1,270	-17.6
Merced (Merced)	1,061	-33.1	117	11.4	1,178	-30.4
Santa Cruz (Santa Cruz)	396	-45.3	156	-36.1	552	-43.0
Remainder of state	9,997	-3.0	1,955	4.9	11,952	-1.8
Total	104,225	-35.9	60,338	-19.7	164,563	-30.8

(a) Riverside, San Bernardino (b) El Dorado, Placer, Sacramento, Yolo (c) Marin, San Francisco, San Mateo
Source: Construction Industry Research Board

Ventura, Alameda, Contra Costa, Marin, San Francisco, San Mateo, Santa Clara and Solano--average less than 3 percent, against an optimum rate of 5 percent and a statewide average of 6 percent. Given the low level of homebuilding activity in 1990 and probably 1991 as well, there is virtually no prospect of oversupply in these high priced areas.

Even on a statewide basis, there is little evidence of the overbuilding which in other areas has led to long term distress in the residential construction and real estate sectors. During the period of peak homebuilding activity, from 1985 to 1989, California built 68 houses for each 100 new jobs. This ratio is somewhat higher than the national average of 58 houses per 100 jobs, but well below the peak rates of over 100 houses per 100 jobs seen in some of the more excessive markets of the Southwest in the mid-1980s.

There are, to be sure, some scattered pockets of excess supply, notably in the high desert areas of north Los Angeles and San Bernardino Counties. Sales and inventories of higher priced new homes--above $750,000 in most cases--are also out of balance in many areas. But these are small scale developments scattered throughout the state and do not represent a major overhang of supply in the context of the broad market for housing.

The state's low rate of homeownership--only Hawaii and New York are lower--is related to both the high cost of housing and the fact that California is the nation's most urbanized state. However, many current renters are would be homeowners, given prices they can afford in locations they deem acceptable. This large renter population places an effective floor under single family home prices--even an extended period of price stagnation will probably attract additional buyers as incomes rise relative to housing costs.

Demographic forces and prospects for moderate overall inflation point to modest home price appreciation in the years ahead. At the same time, continued above average population and employment growth and the long queue of would be homeowners within the renter population argue against any sustained decline in prices.

Housing Outlook. The 1990-91 housing recession is based mainly on fundamental supply/demand forces, rather than credit market conditions which were major elements in past housing cycles. Slower employment and income growth, a reduction in the rate of household formation, low consumer confidence and high housing prices have been the major contributors to the downturn in sales. Credit conditions have affected construction activity, initially in response to sagging sales and rising inventories, but more recently reflecting regulatory constraints and a more cautious approach by lenders.

In the past, falling mortgage interest rates provided a "jump start" to housing--and the entire economy--first encouraging sales and then construction of new homes. Therefore, the fact that home sales have remained weak even as interest rates declined is a matter of some concern. Builders and real estate agents have reported some pickup traffic and sales in recent weeks, partly reflecting normal seasonal patterns, but also perhaps the early signs of renewed consumer confidence.

The sources of this housing slump suggest that housing may not play its normal leading role in the upturn. It appears that housing is more likely to respond to rising incomes, employment and confidence than to be a source of these recovery elements. Also, given the internationalization of credit markets, it is unclear to what extent the Federal Reserve will be able to influence longer term interest rates, which are still very important to the housing industry. The Fed's early March cut in the Federal funds rate from 6-1/4 to 6 percent was not well received in the bond market: longer term interest rates actually rose on news of the Fed's easing move.

Credit constraints will be a problem for builders at least through the remainder of 1991. This is not an unusual situation. Lenders are always reluctant to fund speculative construction in the early stages of recovery. Until the upturn is well underway, most houses are sold prior to the start of construction. However, California housing has not been a source of distress to financial institutions, and once the new capital requirements are met, construction financing conditions should ease.

The drought poses another question for builders in some parts of the state, including growth areas in Riverside County. Until the water supply situation is clarified, construction in some areas of the state will be constrained by the inability to obtain new water hookups.

Recent permit volume in the 90,000 to 100,000 unit range should prove to be the low point in this homebuilding cycle. But recovery is likely to be slow and a meaningful upturn may not be evident until after mid-year. In these circumstances, total housing permits will likely fall below last year's 164,000 level in 1991, and next year might still see volume of less than 200,000 units.

Longer term, demographics and a somewhat slower pace of migration from other parts of the U.S. argue against a repeat of the 1980s boom. A year or two above the 200,000 unit level would not be surprising, if only to make up for production lost in the recession, but underlying demand will be closer to 190,000 units annually.

Resale volume should pick up a few months before the homebuilding upturn, perhaps as soon as the second quarter of this year. With sales in early 1991 running in the mid-300,000 unit range, it may be difficult to match last year's 447,000 unit volume. Next year should be better, with resales of 475,000 not an unreasonable expectation.

Resale prices have stabilized in the low $190,000 range, and relatively stable prices should be expected for the rest of this year. Even in 1992, price increases statewide of 1 to 2 percent might be expected, reflecting the rising importance of less expensive inland areas of the state. Prices may be somewhat stronger in these lower cost areas, but coastal regions will probably remain unchanged.

Employment Outlook. With building permit volume continuing to decline through the early part of 1991, construction employment may well continue on a downward trend through mid-1991, with only a modest pickup in the second half. This suggests that employment for the full year will fall below the 1990 level. Stronger gains should be evident in 1992 as the housing recovery gains stride. Commercial construction will remain depressed for at least two more years, although by 1992, renewed growth in highway projects, funded by the recently increased motor fuel taxes, should help offset some of this weakness in the heavy construction sector.

Real estate employment may remain weak throughout 1991. Even with a sales upturn in sight, prospective volume may not be sufficient to support an industry geared to sales in the 550,000 unit range. Moreover, with prices expected to remain stable, total commission income may remain below peak 1989 levels next year and even beyond.

Summary

California's real estate and construction industries face many of the same problems as those in other areas of the nation. But far from being "the next disaster", prospects in California are in fact better than in most major regions:

- Commercial oversupply is less severe than in the Southwest or Northeast, and employment growth prospects remain better than the national average. This will mean faster absorption of available space in most parts of California.
- There is no widespread oversupply of new housing. Throughout the 1980s, production was very much in line with underlying market growth.
- The "credit crunch" is temporary and fairly normal for this stage of the business cycle. Because lenders have experienced few losses in California real estate, local builders and developers should be in a superior position to obtain credit once conditions ease later this year and in 1992.
- Home prices in coastal areas are very high, but this reflects economic fundamentals and not a speculative bubble. Vacancy rates in these areas are low, and a large renter population, many of whom are would-be homeowners, makes unlikely any sustained decline in home prices.
- Inland areas are providing the economic safety valve, the source of lower cost housing. Rather than impeding economic growth, gains in employment and industry are following population into these lower cost regions.

VII. RESOURCE INDUSTRIES

Water Resources

California is now completing a fifth consecutive year of drought. March rain and snowfall has eased the situation from severe to manageable, but supplies to agriculture and urban interests alike will again be restricted during the dry summer and early autumn seasons. Storage reserves coming into this wet season had been drawn to minimum levels, and this year's rain and snowfall has simply not been sufficient to both replenish these reserves and provide users throughout the state a full water allocation.

At the end of March, the largest reservoirs such as Shasta, Oroville and Folsom in the northern part of the state, remained at less than 40 percent of capacity and roughly half of normal levels for the time of year. The precipitation shortfall has generally been more pronounced in these far northern areas where the heaviest rain and snow normally falls. Even after the March storms, precipitation in the northern Sierra watershed has been little more than 60 percent of normal during the 1990-91 water year. Moreover, although snow depth in these Sierra watersheds was at or above normal for early spring, water content of the snow was generally about three quarters of average, suggesting a below normal runoff.

These low reservoir levels illustrate the need to conserve water despite the ample late season rains. Moreover, even if rainfall returns to near normal levels, it would be irresponsible to ignore the lessons of the drought. The state must strive to achieve a more rational allocation of its scarce water resources.

In normal years, Californians use about 35 million acre feet of water. An acre foot is about 326,000 gallons--the amount of water which covers an acre to the depth of one foot. Normal rain and snowfall amounts to over 190 million acre feet which yields surface runoff of about 71 million acre feet--the remainder is consumed by plants, soaks into the ground or evaporates. A little over half of the 71 million acre foot runoff can be captured in the 150 major reservoirs throughout the state. Normally, surface water supplies about 60 percent of the state's needs, with the remainder coming from ground water pumping and out-of-state watersheds, mainly the Colorado River allotment to Southern California.

Agriculture accounts for about 85 percent of water consumed in California. Residences take about 10 percent, mostly for landscaping. Commercial and industrial users account for the remaining 5 percent, about half for landscape purposes.

About three quarters of the state's precipitation falls in the area north of Sacramento, while about three quarters of the water demand is from users to the south of the Capital City. Hence, a large and sophisticated water delivery system has been constructed to move water from the wet north to the dry south. The major elements of this system are the State Water Project, built and operated by the State of California, and the Federal Central Valley Project, operated by the U.S. Bureau of Reclamation. Between them, these

Table VII-1
Northern California Water Situation
As of March 27

Reservoir Storage *Lake (County)*	*Thousand Acre Feet* *Feb 28*	 *Mar 27*	*% of* *Normal*
Clair Engle (Trinity)	961	1,028	51
Shasta (Shasta)	1,543	1,950	52
Oroville (Butte)	940	1,272	45
New Bullards Bar (Yuba)	503	632	103
Folsom (El Dorado)	167	387	59
San Luis (Merced)	682	1,102	51
Pine Flat (Fresno)	46	155	28

Sierra Snowpack *Water Content*	*% of Normal* *Feb 28*	 *Mar 27*
Northern Sierra	17	68
Central Sierra	13	71
Southern Sierra	12	81
Statewide average	14	73

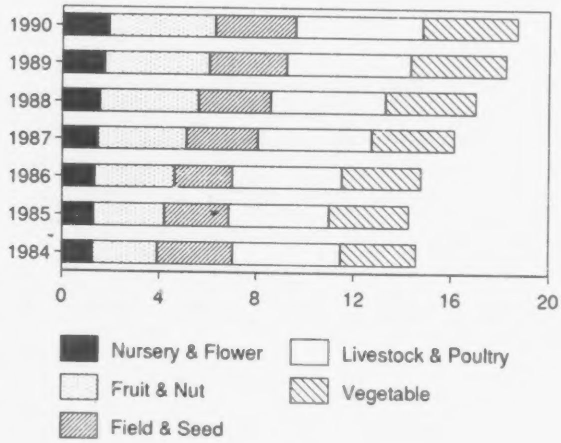
Source: Department of Water Resources

two giant projects supply one third of the state's water needs. There are also several large scale municipal systems, serving the Bay Area, Los Angeles Basin and several Central Valley communities, which move water from one area of the state to another.

Over the years, a complex system of water rights and entitlements has developed in law, ranging from common law based riparian rights, for users adjacent to rivers and streams, to historical appropriative rights, which recognize historical claims of users who have developed systems to transport water for their needs, to the more recent public trust doctrine which holds that government has a duty to protect fish, wildlife and the environment.

In dry years such as these, public water policy must balance these legal rights together with the economic needs of the state's citizens and industry. Agriculture is the principal water user, but to the farm sector water is a vital raw material without which the industry could not exist. The same may be true of some industrial processes, representing no more than 2-3 percent of water use. Residential and many commercial users, on the other hand, apply most of their water to lawns and shrubs. Water actually required for sanitation, food preparation and drinking represents a tiny fraction of California's water consumption.

This year all interests in California will be asked to sacrifice. There will be reductions in farm acreage, increased expense for water saving irrigation systems, and substitution of less water intensive crops for those which consume more water. Residential and commercial users will be asked to significantly reduce their water consumption. For most this will mean cutting back significantly on outdoor uses: less watering of lawns and shrubs, and certainly eliminating wasteful practices such as hosing down walks and driveways and allowing garden irrigation to run in the streets.


Value of Production for Crop Groups
($ billions)

To help allocate the shortage, the State has established a "water bank" through which water is being purchased mainly from agricultural interests and resold to farm and nonfarm users in the driest areas of the state. The water bank concept will help facilitate the allocation of the scarcity and bring water to areas where the absolute need is greatest. This is among the ways the State hopes to help protect vineyards and orchards, industrial processes and the hardest hit commercial and residential users in the state.

Despite the difficulties which the drought will present, especially in the agricultural sector, the overall impact on the state's diverse economy will be minimal. Farm earnings may be $1 billion less than if water supplies were closer to normal. Farm proprietors, wage earners and suppliers will feel some effects. Water oriented recreational interests may also suffer again in 1991. In some areas, new construction activity may be restricted or postponed until the water situation is clarified.

Without depreciating individual hardships which may result, the losses must be evaluated in the context of the state's total output of goods and services, which will approach $800 billion in 1991. At most, the drought will reduce the growth of output by a small fraction of one percent this year.

Agriculture

California's agricultural sector managed to increase its value of marketed produce in 1990 in the face of formidable obstacles. At year end, however, the outlook was dimmed by a record-breaking freeze in late December and a drought that extended into its fifth year with little evidence of abating.

The December freeze caused approximately $800 million in damage, and State and Federal governments declared disasters in a majority of counties. The navel orange crop suffered the biggest setback with about 65 percent of the crop lost for the fresh market. In addition, permanent damage was done to some orchards, the effects of which may linger for several years.

Although devastating to individual growers and communities dependent on the fruit, the effect on California agriculture as a whole has been cushioned by the fact that the industry is not dependent on any one crop. In 1989, oranges represented $438 million or 2.4 percent of total farm receipts. The net effect of the freeze on the dollar value of total farm receipts in 1991 is difficult to gauge. Those growers who escaped the freeze, primarily in the southern parts of the state, have seen prices for these crops rise sharply.

The challenge now facing California agriculture is the water shortage. Problems related to the allocation of the limited water supply are eclipsing even the dramatic losses from the freeze and the environmental issues and trade negotiations that dominated the agricultural scene during 1990.

Throughout the agricultural sector changes are taking place to make the best use of available water. Ground-water supplies will be drawn down to supplement the lack of surface water run-off.

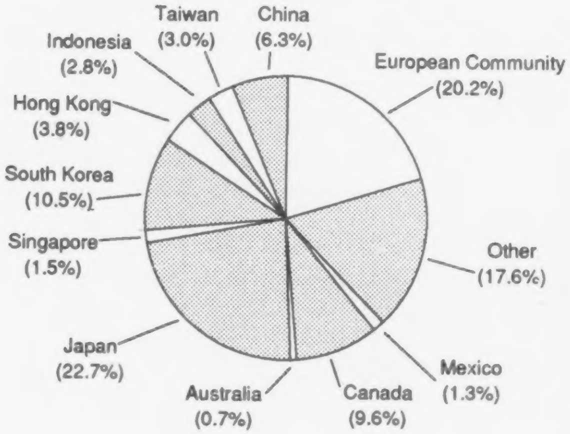
Water conservation practices have been increasing throughout the past four dry years and will be accentuated in 1991. Current economizing techniques include using drip irrigation systems and mulches, sprinkler irrigating at night to save evaporation, watering alternate rows of trees and vines, and replacing high water use crops, such as rice, cotton and alfalfa, with low water crops, such as safflower.

Creativity in water transfers, first seen in 1990, will extend throughout the state. Trading between water districts, water sales and allocation to high investment permanent trees and vines will be used more widely. Although many shifts in production and prices will occur, placing scarce water on the highest value crops will keep gross agricultural income from falling off dramatically.

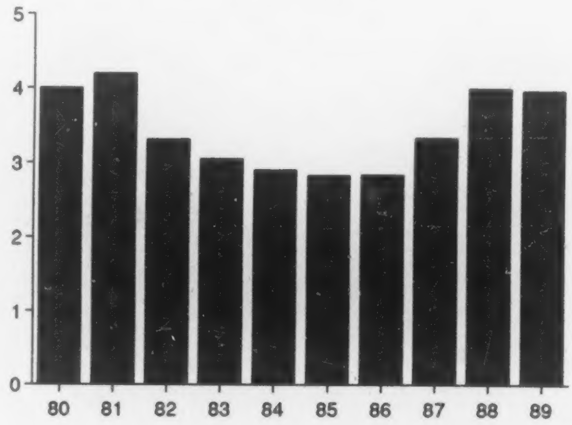
Production. The beef-producing sector, especially the cow/calf ranches in the coastal and mountainous areas, has already been cut back to survival levels by the four dry years. Continued drought will limit ranchers to what can be produced on sharply reduced irrigated pastures and purchased hay and grain. Some breeding stock will be maintained by feeding vegetable field waste, and sheep will be pastured on the cuttings of many irrigated crops.

Ground water is already the sole source of irrigation for the Salinas Valley, long-considered California's salad bowl. Supplies in this region were enhanced by the March rains and, in addition, increased use of drip irrigation and some movement of crops into areas with better water supplies will minimize the drop in summer vegetable production. Winter vegetables grown in the Imperial Valley depend on the Colorado River--a watershed which was unaffected by the drought. Thus the high-value fresh vegetable segment of California's

California's Agricultural Export Markets
Percent Shares, 1989



California's Agricultural Exports
Valued At Port, 1980-1989
($ billions)



production will be maintained. These two areas account for the lion's share of the state's vegetable, melon and strawberry crops. The 1990 harvest was valued at $3.9 billion, 22 percent of total agricultural sales for the year.

Production of field crops such as wheat, barley, corn, rice, sugar beets and hay was down in 1990 and the trend can be expected to continue this year as water supplies are reduced.

High value crops will receive a larger share of the short water supplies, extending a pattern that began before 1990. Production value in 1990 was up at least 10 percent over 1989 for citrus fruits, almonds, pistachios, kiwifruit, plums, nectarines, Freestone peaches and avocados.

Grapes continue to lead all crops, accounting for over 40 percent of the value of fruits and nuts that totaled $4.4 billion in 1990. A trend toward premium wine sales and increased fresh grape consumption helped grapes to exceed all products except milk and cream in 1989.

Exports. Although the value of California's agricultural exports did not increase between 1988 and 1989, the 1990 preliminary reports show cotton and horticultural products recording substantial gains. These are California's major products and will lengthen the state's lead in agricultural exports, because those states depending on sales of grains and soybeans are not showing increases.

Higher-value-added products will be featured in California's exports in the future. Export promotion efforts of the Department of Food and Agriculture will continue to provide matching funds for export advertising, store demonstrations, trade show exhibits and other promotion activities.

What's Ahead. More consumers are enjoying California products throughout the state, the U.S. and the world. Markets for California's specialties will expand to emerging areas such as Eastern Europe and to expanding consumer groups such as increasingly health-conscious senior citizens. Packaging almonds with dried fish in Japan has added to an already growing market. Prepeeled citrus meets an institutional need and will appear on airline and hospital snack trays. Wine will be bottled in a "dinner for two" size bottle better suited to the special occasion use of premium wines.

A national nutrition program to promote "5-a-day" servings of fruits and vegetables launched in 1990 will be expanded in 1991. California growers can expect to benefit from increased sales since one-half of the nation's fruits and vegetables are grown in the state. Keeping a competitive edge over other growing areas, especially Mexico, will be a challenge for California agriculture during the 1990s.

Interest in ethnic and exotic foods is expanding, and California is in an excellent position to capitalize on these markets. Asian vegetables were a $25 million dollar industry in 1989, up from less than $4 million in 1980. As a separate vegetable item, snow peas have become a nearly $30 million dollar crop. Growers are finding increasing markets for chayote, jicama, nopalitos and jalepeno peppers all favored by Mexican cuisine fanciers. Fuju persimmons, Brazilian feijoas, South American pepinos and tropical starfruit (carambolas) are finding their way into our supermarkets. California growers are willing and ready to expand into these new consumer markets.

The water shortage exacerbates another long-standing problem for California agriculture: the loss of prime farmland to urban and industrial uses. Encroachment is a natural outgrowth of the remarkable population gains recorded in California and farmers are finding that they can sell their land to developers for lucrative gains. New methods of farmland preservation will be promoted in various ways and the advantages of keeping land and water in the agricultural sector need to be emphasized as in the water situation.

Environmental problems seem to be temporarily eclipsed by the water shortage, but the pressure against chemical use, and the movements for animal rights, endangered species and wilderness preservation and cleaner air all remain active. Agriculture is adapting to each issue in a variety of ways and the production techniques of the next decade will reflect many changes.

Adaptation to new markets and new pressures will mark the successful California ranchers and growers in the 1990s. To remain the nation's leading agricultural state will be ever challenging.

Farm Employment. The opening months of 1991 have seen sharp declines in agricultural employment, mainly reflecting effects of the severe freeze in the northern and central regions of the state. While the freeze-related disruption will probably prove temporary, the prospect of reduced plantings of such water intensive crops as rice and cotton will probably lead to reduced levels of agricultural employment throughout much of the year.

Gauging the overall effects of the freeze and drought on farm labor demand is difficult, however. Not all land affected by the drought will be idled; other crops will be substituted in many cases. Installation and use of such water saving methods as drip irrigation can be relatively labor intensive. Even the freeze may boost labor demand later this year, as orchards may require additional pruning or even replacement in some instances.

Minerals and Mining

The value of California's non-fuel mineral production declined 4.6 percent in 1990 to $2.72 billion. The drop was primarily due to a decrease in the production of Portland cement and construction aggregates. The value of gold production increased 6.6 percent in 1990 to $391 million.

There are more than 1,100 producing and intermittently producing mines in California; about two-thirds are construction aggregate operations, 26 percent are industrial mineral mines and 8 percent are metal, mainly gold, mines. Employment in metallic (industrial minerals and precious metals) and nonmetallic (construction materials such as sand, gravel and rock) mining together increased 0.5 percent in 1990 to 9,100 wage and salary workers.

Table VII-2
Mining Employment
(In thousands)

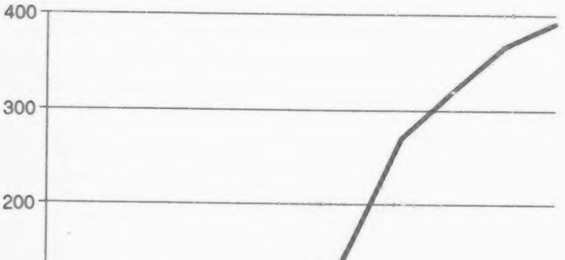
	1988	1989	1990
Total	42.0	40.2	39.8
Metal mining	2.1	2.3	[illegible]
Fuel extraction	33.0	31.1	30.8
Nonmetallic mining	6.8	6.7	6.7

Source: California Employment Development Department
California Department of Finance

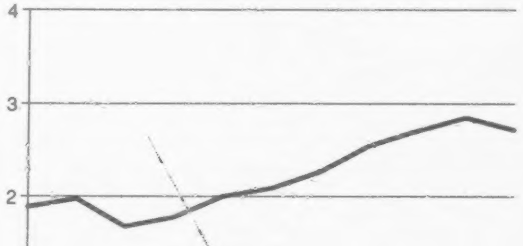
California led all states in the production of asbestos, boron minerals, Portland cement, diatomite, gypsum, construction aggregate, rare-earth concentrates and tungsten. The State was second in the production of natural calcium chloride, feldspar, byproduct gypsum, magnesium compounds from seawater and brines, sodium compounds and gold.

Mineral production in California is closely related to population growth and the resulting home, commercial, and industrial development. Mineral commodities are expected to become more costly and difficult to produce in the future, as competition for land-use in California increases and mining permits become more difficult to obtain.

California Gold Production
($ millions)



California
Non-fuel Mineral Production
($ billions)



Employment in California's mineral extraction industry averaged just under 40,000 in 1990, down fractionally on the year. Petroleum and natural gas extraction is the largest segment, employing 31,000 or about three-quarters of the total. Non-metallic mining employs 6,700 while metal mining accounts for the remaining 2,400 jobs.

Energy

California continues to depend on petroleum and natural gas as its major energy sources. State consumption of these two fuels has increased 15 percent over the past five years. Crude oil accounts for nearly 60 percent of the state's total energy demand and natural gas for about 30 percent. Of total end-use energy, 13 percent is consumed in residences, 40 percent in commerce and industry, and 47 percent in transportation.

Oil. State oil production in 1990 decreased for the fifth year in a row to an average of 962,000 barrels per day. This was a 3.7 percent decline from 1989's 997,900 barrels per day and a 17.2 percent drop from the all time high of 1,160,000 barrels per day in 1985.

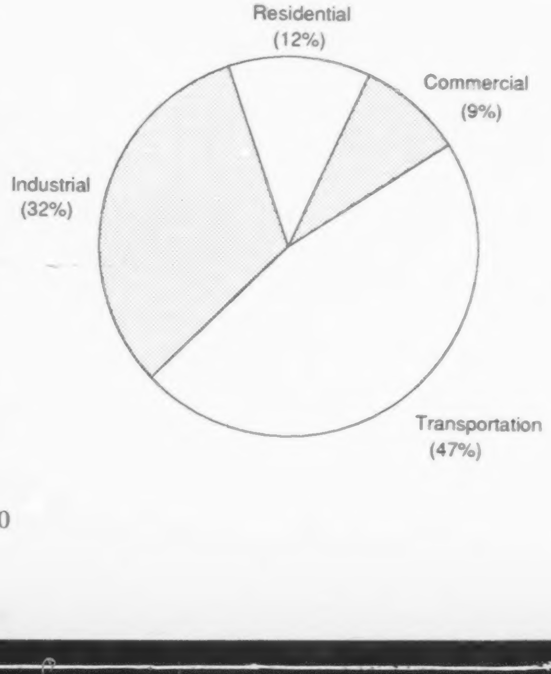
The continued decline in state production was largely due to relatively low oil prices prior to the Iraqi invasion of Kuwait. Following the outbreak of hostilities in the Middle East, the price of oil fluctuated dramatically. The world average crude oil price reached a high of $36 per barrel in September; the low for the year was $13 per barrel in June. Oil prices had collapsed to roughly half their recent highs by early 1991. Over the longer term, oil and gas prices are expected to trend upward, although a repeat of the sharp sustained increases witnessed in the 1970s is unlikely.

Three quarters of the oil in California is consumed for transportation, where demand is near an all-time high. Californians are consuming close to 13 billion gallons of gasoline annually, up from 11-1/2 billion in 1979. Aviation fuel use in California, now about 15 percent of total transportation fuel use, grew more than twice as fast as gasoline use over the past decade.

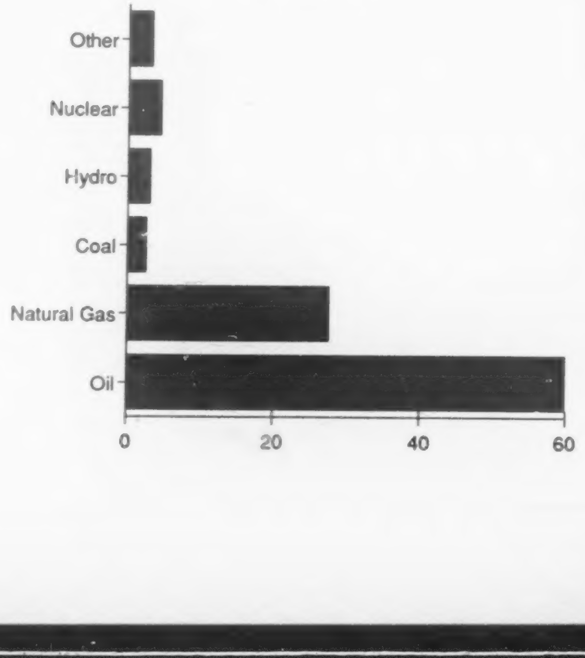
California produces roughly 13 percent of the nation's domestic crude oil and ranks fourth among oil-producing states, behind Alaska, Texas, and Louisiana. Since 1971, Kern County has been the leading oil-producing California county, accounting for about 65 percent of the state's total onshore and offshore production. Los Angeles County has been in second place with approximately 12 percent of the total. At the beginning of 1990, the state's proved oil reserves were estimated at 4.5 billion barrels, down from 5.2 billion barrels a decade ago.

The state imported about half of its crude oil needs in 1990. Foreign sources, primarily Indonesia, provided about 8 percent, while Alaska supplied around 45

California Energy Use



California's Energy Resources
(Percent)



percent. Alaskan production is expected to decline through the 1990's, however, which would require California to rely more heavily on foreign sources.

Natural Gas. Natural gas production in California decreased 2.3 percent in 1990 to 368 billion cubic feet. As with oil production, this was the fifth consecutive year of decline. The decline is expected to continue at about 4 percent per year. It is likely that by the turn of the century, California-produced gas will comprise about 12 percent of the state's supplies, down from approximately 20 percent currently. The primary out-of-state sources are Canada and the Southwest. In early 1991, construction began on two major interstate pipelines that will bring gas to California from the Southwest and Rocky Mountains. Construction of a third pipeline, originating in Canada, is expected to begin early next year.

Natural gas prices remain a bargain compared to oil prices. Deregulation of the natural gas industry has produced competition for sales of gas. In effect, natural gas suppliers are competing with each other for market share, and not against oil suppliers. State and Federal gas regulators continue to focus on making the gas supply system more sensitive to market forces in order to increase the efficiency and reliability of gas service. The goal is two fold: to enhance competition among gas sellers and to provide equal access to the regulated gas pipeline network for all gas suppliers.

Electricity. In 1990, over one half of California's electric energy came from nonfossil sources. California has the world's largest installed capacity of geothermal power plants, 82 percent of the world's installed wind capacity, and almost all of the world's utility-sized solar generation. Hydroelectric generation is also a major source of nonfossil generation.

The state is part of the largest interconnected electrical system in the nation, which has allowed California utilities to increase purchases of surplus energy from out-of-state. As capacity of interstate transmission lines increases, interutility power transactions continue to grow. There is a growing regional market in competitive power sales throughout the Western Grid, which stretches from the Rockies to the Pacific and from Canada to northern Mexico.

The view of electric service as a monopoly has been changing in the face of rapid growth in California's independent power industry. Virtually nonexistent in 1980, independent power developers now generate 13 percent of the state's electricity supply. The majority of new California electricity supplies will likely come from these developers, who will compete among themselves and with the utilities to build and operate power plants.

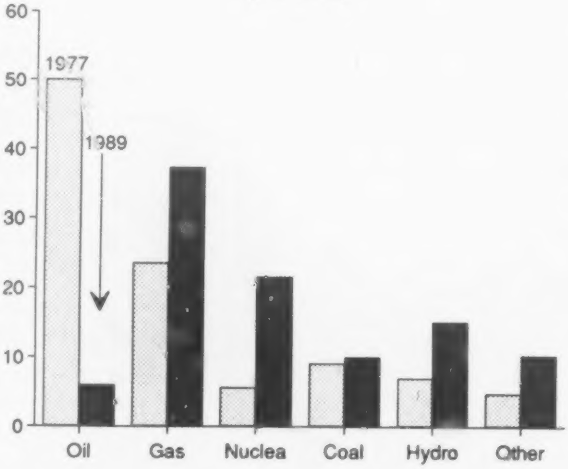
Demand for electricity in California is expected to outpace the growth in population during the 1990s, with demand in the commercial sector growing the fastest.

Conservation has a significant effect on the state's energy growth trends and there exists a large potential for electricity savings through efficiency measures. In 1990, an agreement among the State Energy Commission, Public Utilities Commission, investor-owned utilities, and public interest groups resulted in the expansion of conservation programs and the development of shareholder incentive mechanisms to put funding for end-use efficiency on a more equal footing with traditional ratemaking principles. The agreement signals a rededication to the effectiveness of energy efficiency as a utility resource.

Air Quality

Oil use is a source of increasing environmental concern. Transportation, which produces over half of the air pollution in California, is at the heart of the issue. Developing and introducing cleaner fuels and vehicles has become an important goal of pollution control efforts throughout the state and the nation.

Sources of Electricity
(Percent)



Efforts to introduce clean-burning transportation fuels gained momentum in 1990. The U.S. Clean Air Act Amendments of 1990 require that beginning in 1996, 150,000 clean-fueled cars be sold each year in California; that number will increase to 300,000 in 1999. The California Air Resources Board adopted controls last year that for the first time combine vehicle emission standards with that of fuel specifications.

Several oil companies have already introduced "reformulated" gasolines that reduce pollution emitted from conventional vehicles. In 1991, General Motors will manufacture the first mass produced "dedicated" natural gas vehicles, which will burn only natural gas.

As well as looking at fuels and vehicles, efforts are being made to change the way Californians travel. Air and transportation agencies are working together to establish programs that encourage alternatives to single occupant vehicles.

Air quality problems must also be addressed in choosing new electricity resources. The California Energy Commission has developed and implemented a method to incorporate air pollution concerns directly into the valuation of different types of power plants. Over the last year, joint planning for energy and air quality goals has increased and is receiving wider attention among air quality management districts. To address the problem of harmful emissions put out by consumer products, the California Air Resources Board has adopted regulations, effective beginning in 1993, that will limit smog-forming compounds in household cleaners, as well as garden, automotive and personal care products.

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TABLE 1

POPULATION OF THE UNITED STATES AND CALIFORNIA, 1960–90 [a]

Year (July 1)	United States [1]	California [2]	California as percent of United States	Percent change	
				United States	California
1960	179,979,000	15,863,000	8.8	1.6	3.8
1961	182,973,000	16,412,000	9.0	1.7	3.5
1962	185,738,000	16,951,000	9.1	1.5	3.3
1963	188,438,000	17,530,000	9.3	1.5	3.4
1964	191,085,000	18,026,000	9.4	1.4	2.8
1965	193,460,000	18,464,000	9.5	1.2	2.4
1966	195,501,000	18,831,000	9.6	1.1	2.0
1967	197,374,000	19,174,700	9.7	1.0	1.8
1968	199,312,000	19,432,000	9.7	1.0	1.3
1969	201,306,000	19,744,700	9.8	1.0	1.6
1970	203,984,000	20,039,000	9.8	1.3	1.5
1971	206,827,000	20,346,000	9.8	1.4	1.5
1972	209,284,000	20,585,000	9.8	1.2	1.2
1973	211,357,000	20,869,000	9.9	1.0	1.4
1974	213,342,000	21,174,000	9.9	0.0	1.5
1975	215,465,000	21,538,000	10.0	1.0	1.7
1976	217,563,000	21,936,000	10.1	1.0	1.8
1977	219,760,000	22,352,000	10.2	1.0	1.9
1978	222,095,000	22,836,000	10.3	1.1	2.2
1979	224,567,000	23,257,000	10.4	1.1	1.8
1980	227,217,000	23,782,000	10.5	1.2	2.2
1981	229,444,000	24,278,000	10.6	1.0	2.1
1982	231,648,000	24,805,000	10.7	1.0	2.2
1983	233,781,000	25,337,000	10.8	0.9	2.1
1984	235,820,000	25,816,000	11.0	0.9	1.9
1985	237,924,000	26,403,000	11.1	0.9	2.3
1986	240,140,000	27,052,000	11.3	1.0	2.5
1987	242,305,000	27,717,000	11.4	0.9	2.5
1988	244,529,000	28,393,000	11.6	0.9	2.4
1989	246,828,000	29,142,000	11.8	0.9	2.6
1990	249,466,000	29,976,000	12.0	1.1	2.9

[a] Includes members of the Armed Forces stationed in the area.

[1] Source: 1960–1989 U.S. Bureau of the Census, Current Population Reports P-25.

[2] Source: 1960–69 California Department of Finance, Demographic Research Unit.
1970–79 U.S. Bureau of Census Current Population Reports P-25.
1980–90 California Department of Finance, Demographic Research Unit.

TABLE 2

COMPONENTS OF CHANGE IN CALIFORNIA'S CIVILIAN POPULATION, 1960–90

Year (July 1)	Civilian population [1]	Net change	Net migration [2]	Natural increase [3]	Gains from military
1960	15,550,000	586,000	351,000	231,000	+4,000
1961	16,108,000	558,000	308,000	244,000	+6,000
1962	16,634,000	526,000	306,000	240,000	−20,000
1963	17,197,000	563,000	320,000	234,000	+9,000
1964	17,706,000	509,000	308,000	230,000	−29,000
1965	18,143,000	437,000	232,000	217,000	−12,000
1966	18,459,000	316,000	179,000	185,000	−48,000
1967	18,796,000	337,000	198,000	184,000	−45,000
1968	19,046,000	250,000	102,000	176,000	−28,000
1969	19,354,000	308,000	118,000	185,000	+5,000
1970	19,663,000	309,000	96,000	193,000	+20,000
1971	20,002,000	339,000	128,000	184,000	+27,000
1972	20,264,000	262,000	98,000	144,000	+20,000
1973	20,558,000	294,000	162,000	130,000	+2,000
1974	20,874,000	316,000	182,000	131,000	+3,000
1975	21,249,000	375,000	228,000	145,000	+2,000
1976	21,653,000	404,000	248,000	153,000	+3,000
1977	22,075,000	422,000	248,000	174,000	—
1978	22,566,000	491,000	314,000	177,000	—
1979	22,991,000	425,000	234,000	191,000	—
1980	23,511,000	520,000	310,000	210,000	—
1981	24,004,000	493,000	268,000	225,000	—
1982	24,517,000	513,000	274,000	239,000	—
1983	25,050,000	533,000	286,000	247,000	—
1984	25,518,000	468,000	222,000	246,000	—
1985	26,100,000	582,000	327,000	255,000	—
1986	26,746,000	646,000	365,000	281,000	—
1987	27,408,000	662,000	376,000	286,000	—
1988	28,092,000	684,000	382,000	302,000	—
1989	28,835,000	743,000	413,000	330,000	—
1990	29,677,000	842,000	452,000	390,000	—

[1] Source: 1960–1979 U.S. Bureau of Census.
1980–1990 California Department of Finance, Demographic Research Unit.

[2] Source: California Department of Finance, Demographic Research Unit.

[3] Source: California Department of Finance, Demographic Research Unit.

TABLE 3

TOTAL POPULATION OF CALIFORNIA COUNTIES, JULY 1, 1990

County	Total population 7-1-90	County	Total population 7-1-90
Alameda	1,282,400	Placer	175,600
Alpine	1,100	Plumas	19,900
Amador	30,600	Riverside	1,195,400
Butte	183,900	Sacramento	1,051,400
Calaveras	32,500	San Benito	37,000
Colusa	16,400	San Bernardino	1,440,700
Contra Costa	810,300	San Diego	2,520,500
Del Norte	24,500	San Francisco	723,900
El Dorado	128,200	San Joaquin	483,800
Fresno	673,900	San Luis Obispo	219,500
Glenn	25,000	San Mateo	652,100
Humboldt	119,800	Santa Barbara	371,400
Imperial	110,400	Santa Clara	1,502,200
Inyo	18,400	Santa Cruz	230,800
Kern	549,800	Shasta	148,800
Kings	102,500	Sierra	3,400
Lake	51,100	Siskiyou	43,800
Lassen	27,800	Solano	345,700
Los Angeles	8,897,500	Sonoma	392,000
Madera	89,800	Stanislaus	376,100
Marin	231,200	Sutter	65,100
Mariposa	14,500	Tehama	50,100
Mendocino	81,000	Trinity	13,100
Merced	180,600	Tulare	314,600
Modoc	9,700	Tuolumne	49,000
Mono	10,200	Ventura	671,600
Monterey	358,800	Yolo	142,500
Napa	111,700	Yuba	58,700
Nevada	79,600		
Orange	2,424,100	California	29,976,000

Source: California Department of Finance, Demographic Research Unit.

TABLE 4
CIVILIAN LABOR FORCE, CALIFORNIA, 1967–90
(In thousands)

Year and month	Labor force [a]	Employed [b]	Unemployed [c]	Percent unemployed
1967	7,831	7,441	389	5.0
1968	8,090	7,724	366	4.5
1969	8,388	8,016	372	4.4
1970	8,167	7,575	592	7.3
1971	8,407	7,669	739	8.8
1972	8,653	7,996	656	7.6
1973	8,910	8,286	624	7.0
1974	9,317	8,638	679	7.3
1975	9,539	8,598	941	9.9
1976	9,896	8,990	906	9.2
1977	10,367	9,513	853	8.2
1978	10,911	10,137	775	7.1
1979	11,268	10,566	702	6.2
1980	11,584	10,794	790	6.8
1981	11,812	10,938	875	7.4
1982	12,178	10,967	1,210	9.9
1983	12,281	11,095	1,187	9.7
1984	12,610	11,631	980	7.8
1985	12,981	12,048	934	7.2
1986	13,332	12,442	890	6.7
1987	13,737	12,946	791	5.8
1988	14,133	13,385	748	5.3
1989	14,518	13,780	737	5.1
1990	14,670	13,846	823	5.6
Adjusted for seasonal variation				
1989 January	14,409	13,694	715	5.0
February	14,385	13,652	733	5.1
March	14,346	13,687	659	4.6
April	14,306	13,560	746	5.2
May	14,462	13,709	753	5.2
June	14,509	13,686	823	5.7
July	14,598	13,813	785	5.4
August	14,552	13,869	683	4.7
September	14,662	13,912	750	5.1
October	14,677	13,949	728	5.0
November	14,660	13,935	725	4.9
December	14,622	13,877	745	5.1
1990 January	14,525	13,778	747	5.1
February	14,555	13,835	720	4.9
March	14,636	13,874	762	5.2
April	14,673	13,890	783	5.3
May	14,753	13,960	793	5.4
June	14,783	14,024	759	5.1
July	14,731	13,955	776	5.3
August	14,803	13,987	816	5.5
September	14,634	13,764	870	5.9
October	14,633	13,739	894	6.1
November	14,623	13,666	957	6.5
December	14,675	13,672	1,003	6.8

[a] Detail may not add to total because of rounding.

[b] Includes wage and salary workers, employers, own-account workers, and unpaid family workers. Excludes workers directly involved in work stoppages who receive no pay for the payroll period which includes 12th of the month.

[c] Excludes the potential or latent supply of workers not active in the labor market and workers directly involved in work stoppages.

Source: California Employment Development Department.

TABLE 5

WAGE AND SALARY WORKERS IN NONAGRICULTURAL ESTABLISHMENTS BY MAJOR INDUSTRY DIVISION, CALIFORNIA, 1972–90 [a] [b]

(In thousands)

Year	Total	Mineral extraction	Construction	Manufacturing	Transportation and utilities	Trade	Finance, insurance, and real estate	Services	Government
1972	7,209.9	29.2	312.4	1,542.7	454.1	1,608.6	409.3	1,361.0	1,492.7
1973	7,621.9	30.5	333.4	1,660.7	467.0	1,703.2	431.6	1,470.6	1,524.8
1974	7,834.3	32.7	317.8	1,701.3	470.7	1,751.9	444.8	1,529.1	1,586.0
1975	7,847.2	33.9	285.9	1,593.7	458.1	1,786.3	446.4	1,572.4	1,670.6
1976	8,154.2	34.7	301.3	1,659.8	463.9	1,875.6	468.7	1,654.6	1,695.6
1977	8,599.7	35.6	350.4	1,737.8	476.5	1,982.4	505.4	1,770.9	1,740.7
1978	9,199.8	37.1	401.9	1,884.6	506.5	2,126.0	553.2	1,937.4	1,753.1
1979	9,664.6	39.3	448.7	2,012.7	534.7	2,223.8	595.9	2,074.6	1,735.0
1980	9,848.8	43.5	428.3	2,018.2	546.3	2,266.9	623.1	2,158.8	1,763.9
1981	9,985.3	49.2	407.6	2,032.3	554.8	2,301.6	642.9	2,240.5	1,756.4
1982	9,810.3	50.4	349.0	1,957.7	542.8	2,275.3	642.4	2,257.7	1,735.2
1983	9,965.8	48.1	369.3	1,949.3	536.9	2,343.9	661.7	2,332.2	1,724.3
1984	10,573.8	50.0	445.2	2,065.5	554.6	2,507.4	694.2	2,509.5	1,747.4
1985	10,979.1	49.9	496.2	2,076.1	568.7	2,626.1	724.5	2,644.8	1,792.8
1986	11,258.1	42.6	531.0	2,069.7	574.6	2,686.4	763.7	2,751.3	1,838.8
1987	11,678.5	41.0	574.5	2,107.6	582.6	2,761.4	800.9	2,926.7	1,883.7
1988 [c]	12,103.4	42.0	603.3	2,149.2	589.0	2,874.4	807.3	3,104.1	1,934.1
1989	12,569.9	40.2	648.1	2,161.4	607.1	2,973.9	832.8	3,307.8	1,998.7
1990	12,872.7	39.0	667.3	2,122.8	628.6	3,025.8	845.1	3,472.6	2,071.4

[a] Does not include employers, own-account workers, unpaid family workers, domestic servants, and agricultural workers.

[b] Data for 1972–1987 are based on the 1972 SIC codes. 1988–90 are based on the 1987 SIC codes.

[c] Data for 1988–90 are not comparable with prior years due to SIC code changes.

(Official U.S. Bureau of Labor Statistics series. The text portion of the report uses the interim series prepared by the Department of Finance.)

Source: California Employment Development Department.

TABLE 6

WAGE AND SALARY WORKERS [a] IN NONAGRICULTURAL ESTABLISHMENTS, BY MAJOR INDUSTRY DIVISION, SELECTED AREAS, 1989 AND 1990

(In thousands)

Area and year	Total	Mineral extraction	Construction	Manufacturing	Transportation and utilities	Trade	Finance, insurance, and real estate	Services	Government
Anaheim-Santa Ana									
1989	1,190.5	1.3	72.5	256.6	34.8	297.9	96.9	310.0	120.5
1990	1,219.0	1.3	69.0	253.0	37.9	303.3	102.5	326.3	125.8
Bakersfield									
1989	167.3	13.6	10.6	10.8	8.1 [b]	39.9	6.5	35.5	42.4
1990	171.4	14.3	11.3	10.9	8.3 [b]	40.2	6.8	36.0	43.7
Fresno									
1989	217.7	0.6	12.7	24.9	12.3	55.8	12.3	50.9	48.1
1990	232.0	0.6	14.5	26.6	12.9	58.9	13.3	54.3	51.0
Los Angeles-Long Beach									
1989	4,220.6	8.7	154.4	886.2	213.6	961.4	288.4	1,186.1	521.8
1990	4,297.8	8.4	160.5	858.9	221.6	972.0	292.5	1,245.7	538.4
Modesto									
1989	115.3	0.1	8.3	25.3	4.7	29.4	5.2	23.5	18.8
1990	120.9	0.0	8.9	26.2	5.1	31.0	5.0	24.7	20.1
Oakland									
1989	880.0	3.9	52.6	113.5	58.1	213.9	57.1	216.3	164.6
1990	901.0	3.3	51.8	113.3	61.2	220.0	57.9	225.9	167.5
Oxnard-Ventura									
1989	228.0	2.4	16.9	32.3 [b]	11.7	56.5	12.2	53.8	42.1
1990	236.3	2.2	17.8	32.7 [b]	12.2	58.2	12.5	56.7	44.0
Riverside-San Bernardino									
1989	688.2	1.4	65.3	88.2	33.3	170.5	29.8	162.0	137.8
1990	739.9	1.4	67.5	89.8	35.4	184.2	32.6	179.5	149.5
Sacramento									
1989	602.1	0.6	36.7	43.9	27.2	142.1	38.4	134.4	178.7
1990	629.4	0.6	40.7	45.6	28.5	145.7	41.1	142.3	185.0
Salinas-Seaside-Monterey									
1989	110.7	0.3	4.5	10.3	4.7	29.5	5.9	28.0	27.5
1990	113.1	0.3	4.6	10.4	4.7	30.2	6.3	28.7	28.0
San Diego									
1989	964.6	0.8	63.8	135.4	35.8	233.7	66.5	259.5	169.3
1990	995.1	0.7	62.3	136.5	37.1	238.1	67.9	275.7	176.8

TABLE 6—Continued

WAGE AND SALARY WORKERS[a] IN NONAGRICULTURAL ESTABLISHMENTS, BY MAJOR INDUSTRY DIVISION, SELECTED AREAS, 1989 AND 1990

(In thousands)

Area and year	Total	Mineral extraction	Construction	Manufacturing	Transportation and utilities	Trade	Finance, insurance, and real estate	Services	Government
San Francisco									
1989	958.7	0.6[b]	34.7[b]	81.0	75.9	217.2	109.4	303.7	136.2
1990	975.5	0.6[b]	37.1[b]	79.6	78.6	213.9	108.6	318.7	138.6
San Jose									
1989	831.6	0.2	33.7	269.6	21.8	171.0	32.4	215.9	86.9
1990	834.5	0.2	34.2	264.6	22.8	170.0	32.7	220.5	89.6
Santa Barbara-Santa Maria-Lompoc									
1989	149.2	1.3	6.9	22.3	5.4	34.3	8.6	42.0	28.4
1990	151.8	1.2	7.4	22.0	5.5	34.5	8.6	43.3	29.3
Santa Rosa-Petaluma									
1989	135.6	0.6	10.3	21.1	6.2	34.9	8.1	31.2	23.2
1990	144.7	0.5	10.8	21.7	6.7	37.4	8.7	34.9	24.0
Stockton									
1989	152.8	0.1	8.9	24.8	8.9	35.8	9.4	32.4	32.5
1990	156.0	0.1	9.6	24.7	8.9	36.1	9.6	33.2	33.9
Vallejo-Fairfield-Napa									
1989	133.7	0.6	9.9[b]	12.8	4.8	32.4	5.0	29.9	38.4
1990	141.1	0.6	11.6[b]	12.9	5.1	35.1	5.2	32.5	38.1

[a] Does not include employers, own-account workers, unpaid family workers, domestic servants, and agricultural workers.

[b] Data for 1989 and 1990 are not compatible with data prior to 1988 because of the SIC code revision (changed from the 1972 SIC code to the 1987 SIC code).

Area definitions:
Anaheim-Santa Ana—Orange County.
Bakersfield—Kern County.
Fresno—Fresno County.
Los Angeles-Long Beach—Los Angeles County.
Modesto—Stanislaus County.
Oakland—Alameda and Contra Costa Counties.
Oxnard-Ventura—Ventura County.
Riverside-San Bernardino—Riverside and San Bernardino Counties.
Sacramento—El Dorado, Placer, Sacramento, and Yolo Counties.
Salinas-Seaside-Monterey—Monterey County.
San Diego—San Diego County.
San Francisco—Marin, San Francisco, and San Mateo Counties.
San Jose—Santa Clara County.
Santa Barbara-Santa Maria-Lompoc—Santa Barbara County.
Santa Rosa-Petaluma—Sonoma County.
Stockton—San Joaquin County.
Vallejo-Fairfield-Napa—Napa and Solano Counties.

Source: California Employment Development Department.

TABLE 7
WAGE AND SALARY WORKERS IN MANUFACTURING, CALIFORNIA, 1983–90[a]
(In thousands)

Industry	1983	1984	1985	1986	1987	1988	1989	1990
Total	1,949.3	2,065.5	2,076.1	2,069.7	2,107.6	2,149.2	2,161.4	2,122.8
Nondurable goods	622.0	639.2	635.7	652.7	680.4	703.3	719.3	731.0
Durable goods	1,327.3	1,426.3	1,440.4	1,417.0	1,427.2	1,445.9	1,442.1	1,391.8
Nondurable goods								
Food and kindred products	173.4	173.3	169.2	170.6	171.4	175.7	180.5	186.2
Canned, cured, frozen sea foods[b]	8.9	6.8	5.2	5.5	5.7	5.9	4.9	4.7
Meat products	16.7	17.1	17.4	17.4	19.2	19.5	20.3	21.0
Dairy products	13.5	13.0	12.6	12.6	12.3	12.9	13.8	14.2
Canned and preserved fruit and vegetables[b]	52.0	53.6	51.3	50.4	50.6	49.1	52.3	55.4
Grain mill products	8.3	8.2	8.0	8.1	8.4	8.5	8.9	9.8
Bakery products[b]	19.0	19.4	19.4	20.0	19.2	20.4	20.8	21.1
Beverages	25.4	25.2	25.6	26.7	26.8	28.4	28.2	27.8
Other food and kindred products	29.7	30.0	29.8	30.0	29.3	30.9	31.4	32.2
Textile mill products	13.0	13.7	13.9	14.9	16.3	16.6	17.0	16.8
Knitting mills	2.7	3.3	3.8	4.3	4.6	4.3	4.6	4.7
Floor covering mills	3.8	4.0	3.9	4.1	4.3	4.5	4.7	4.2
Other textile mill products	6.4	6.4	6.2	6.5	7.5	7.9	7.7	7.9
Apparel and other textile products	103.2	108.0	107.2	114.7	126.4	126.1	131.6	134.7
Men's, boys' suits and coats[b]	12.0	11.5	9.6	9.5	10.1	9.5	8.8	8.8
Women's and misses' outerwear	63.1	67.0	69.3	75.7	84.4	84.3	87.6	89.3
Women's and children's undergarments	4.0	4.1	3.8	3.9	3.8	3.7	3.8	3.9
Girls', child's outerwear	2.1	2.3	2.1	2.4	2.7	2.7	3.1	3.3
Other apparel and textile products[b]	21.9	23.1	22.4	23.2	25.4	26.0	28.4	29.4
Paper and allied products	37.0	38.7	39.6	40.0	41.1	40.7	41.8	41.8
Miscellaneous converted paper products	15.2	15.8	15.9	16.4	16.9	17.0	17.2	16.9
Paperboard containers and boxes	15.5	16.7	17.6	17.5	18.0	17.7	18.2	18.3
Other paper and allied products[b]	6.3	6.2	6.1	6.1	6.2	6.0	6.4	6.6
Printing and publishing	128.3	136.5	140.1	145.1	152.4	161.4	163.1	166.5
Newspapers	43.2	46.4	47.7	48.9	50.7	52.8	52.3	53.9
Commercial printing	50.7	53.3	54.3	56.0	58.9	61.9	63.5	64.3
Other printing and publishing	34.5	36.8	38.1	40.2	42.8	46.8	47.3	48.3
Chemicals and allied products	63.8	64.1	63.7	64.7	67.8	73.2	73.4	72.8
Industrial inorganic chemicals[b]	7.1	7.4	7.4	7.4	7.1	7.3	7.6	7.5
Plastics materials and synthetics	3.3	3.3	3.1	2.9	3.0	3.4	3.4	3.5
Drugs[b]	19.5	19.3	19.0	20.1	21.4	24.1	24.2	24.0
Soaps, cleaners, toilet goods	12.1	12.4	12.4	13.0	14.4	15.6	15.2	14.8
Paints and allied products	6.7	7.2	7.5	7.5	7.5	7.4	7.3	7.2
Agricultural chemicals	4.1	3.9	3.6	3.3	3.2	3.0	2.9	2.9
Other chemicals and allied products	10.9	10.7	10.8	10.6	11.2	12.3	12.9	12.9
Petroleum and coal products	31.0	30.0	28.8	27.7	27.3	27.8	28.2	27.3
Petroleum refining	27.5	26.5	25.7	24.7	24.2	24.5	24.8	23.8
Other petroleum and coal products[b]	3.6	3.5	3.1	3.0	3.1	3.3	3.5	3.6

TABLE 7—Continued

WAGE AND SALARY WORKERS IN MANUFACTURING, CALIFORNIA, 1983–90 [a]

(In thousands)

Industry	1983	1984	1985	1986	1987	1988	1989	1990
Rubber and plastics products	62.8	66.5	65.7	68.1	70.7	75.4	77.3	78.8
Tires and inner tubes	1.3	1.3	1.2	1.1	1.1	1.1	1.1	1.2
Footwear and fabricated products [b]	10.0	10.4	10.0	9.9	9.9	10.1	9.6	9.1
Miscellaneous plastics products [b]	50.5	54.1	53.6	55.9	58.6	60.5	62.3	63.7
Other rubber and plastics products [b]	.9	.8	1.0	1.2	1.2	3.7	4.3	4.7
Leather and leather products	9.5	8.5	7.5	7.0	6.9	6.3	6.3	6.1
Durable goods								
Lumber and wood products excluding furniture	50.6	55.1	56.1	60.1	66.2	69.2	71.4	67.9
Logging camps, sawmills, planing mills	19.7	20.9	20.5	20.9	22.3	22.6	21.7	19.0
Millwork, plywood, structural members	14.3	16.9	18.4	20.9	24.4	26.5	29.2	28.6
Wooden containers	3.7	4.0	4.1	4.6	4.7	4.6	4.5	5.0
Other lumber and wood products	12.9	13.2	13.0	13.7	14.9	15.5	15.9	15.4
Furniture and fixtures	51.6	59.2	58.9	59.5	63.0	62.0	60.4	57.3
Household furniture	31.1	34.9	34.2	34.5	37.3	37.0	34.2	31.4
Partitions and fixtures [b]	6.8	8.4	8.3	8.4	8.7	8.6	8.6	8.4
Other furniture and fixtures	13.8	16.0	16.5	16.6	17.0	16.4	17.6	17.5
Stone, clay, and glass products	48.7	51.6	50.8	52.5	53.7	54.4	56.7	56.2
Glass and glass products	15.8	15.8	15.1	15.3	15.5	15.6	16.0	16.4
Hydraulic cement [b]	3.3	3.2	2.9	2.9	2.8	2.1	2.0	1.8
Structural clay products	2.4	2.3	2.2	2.2	2.2	2.4	2.7	2.8
Pottery and related products [b]	4.5	4.7	4.1	4.1	4.3	5.0	5.4	5.2
Concrete, gypsum, plaster products	14.2	16.5	17.2	18.3	19.4	21.0	22.0	21.6
Other stone, clay, and glass products [b]	8.4	9.1	9.4	9.9	9.5	8.3	8.6	8.4
Primary metal industries	43.5	42.6	41.6	40.8	42.0	43.6	43.4	41.4
Blast furnace and basic steel products	9.9	7.7	7.9	7.7	8.1	8.8	9.0	8.7
Iron and steel foundries	6.5	6.7	6.4	6.1	6.6	6.7	6.2	5.6
Nonferrous rolling and drawing	13.4	13.7	13.3	12.8	12.7	12.8	12.9	12.1
Nonferrous foundries	9.7	10.3	10.0	10.3	10.7	10.7	10.6	10.3
Other primary metals [b]	4.0	4.2	4.1	3.9	3.9	4.6	4.7	4.7
Fabricated metal products	137.9	146.7	143.5	135.9	134.3	138.8	139.3	134.2
Metal cans and shipping containers	8.9	8.4	8.3	7.9	7.5	7.2	6.9	6.4
Cutlery, hand tools, hardware	14.1	15.0	14.3	14.0	14.5	15.8	15.0	13.6
Plumbling and heating excluding electric [b]	6.7	7.4	7.7	7.4	7.0	8.2	8.7	8.5
Fabricated structural products	44.5	47.0	45.1	41.7	40.5	40.3	41.3	39.7
Screw machine products, bolts, etc.	11.4	12.4	12.6	12.3	13.1	13.4	13.2	13.4
Forgings and stampings	14.2	15.7	15.8	15.6	15.0	14.1	13.6	14.3
Metal services	18.9	20.3	19.9	19.3	20.2	20.9	21.4	20.1
Other fabricated metal products [b]	19.2	20.5	19.9	17.6	16.7	18.9	19.1	18.2

TABLE 7—Continued

WAGE AND SALARY WORKERS IN MANUFACTURING, CALIFORNIA, 1983–90 [a]

(In thousands)

Industry	1983	1984	1985	1986	1987	1988	1989	1990
Industrial machinery	223.4	239.2	229.4	214.0	212.3	219.3	224.1	220.2
Farm and garden	4.7	4.6	4.3	3.7	4.1	4.2	3.7	3.2
Construction and related	14.1	14.3	13.5	11.1	9.8	9.7	9.7	9.3
Metalworking [b]	16.3	17.8	17.7	16.3	16.3	19.1	19.2	18.0
Special industry [b]	12.6	13.7	13.3	12.0	12.0	10.7	10.9	10.5
General industry [b]	18.3	19.7	19.7	18.2	18.0	17.9	19.0	19.1
Office, computing, accounting [b]	109.9	117.9	111.4	107.2	105.8	102.9	105.7	104.1
Refrigeration and service industry	8.4	8.6	9.2	9.0	9.1	9.5	9.3	9.1
Other machinery and equipment [b]	39.2	42.6	40.3	36.5	37.2	45.3	46.5	46.8
Electrical equipment and supplies [b]	365.4	406.3	413.4	399.7	396.9	270.4	268.0	259.0
Electrical distribution equipment [b]	8.0	10.7	11.7	11.5	11.9	12.2	11.7	10.6
Electrical industrial [b]	12.1	14.4	13.2	11.2	10.3	12.7	12.2	10.7
Household appliances	4.5	3.9	3.9	3.8	4.0	4.0	4.2	3.9
Lighting and wiring equipment	20.0	22.0	22.6	22.2	23.4	23.7	23.7	23.2
Household audio and video	13.5	13.7	13.6	14.0	14.5	15.1	15.5	16.0
Communication equipment [b]	158.7	167.2	179.1	179.5	174.3	31.7	32.5	30.7
Electronic components and accessories [b]	139.8	165.3	160.8	148.6	150.4	147.8	146.5	142.0
Miscellaneous electrical equipment and supplies [b]	8.9	9.2	8.4	7.9	8.2	23.3	21.8	21.9
Transportation and equipment	261.9	277.5	297.3	306.7	310.2	304.0	302.4	295.1
Motor vehicles and equipment	30.3	33.4	33.6	32.5	33.3	34.7	33.3	30.3
Aircraft and parts [b]	133.3	141.1	156.7	167.4	171.6	163.6	165.6	165.4
Ship and boat building and repairing	18.7	18.2	17.5	15.4	13.6	13.4	14.2	12.8
Guided missiles, space vehicles and parts	69.3	73.8	78.1	81.0	81.1	81.9	79.9	78.1
Other transportation equipment	10.4	11.1	11.4	10.4	10.5	10.3	9.4	8.5
Instruments and related products [b]	103.7	110.1	113.9	112.2	112.9	247.7	239.4	224.3
Search and navigation [c]	na	na	na	na	na	126.7	114.5	101.9
Measuring and controlling [b]	47.5	51.1	54.1	54.3	54.5	70.9	73.3	70.5
Other instruments and related products[b]	56.2	59.0	59.8	58.0	58.4	50.1	51.6	51.9
Miscellaneous manufacturing	40.6	37.9	35.5	35.5	35.8	36.7	37.1	36.2
Toys and sporting goods	18.3	15.1	13.2	12.4	12.4	12.1	12.1	12.3
Other miscellaneous manufacturing	22.3	22.9	22.3	23.0	23.5	24.6	25.0	23.9

[a] Data for 1982-1987 are based on the 1972 SIC codes. 1988–1990 are based on the 1987 SIC codes.

[b] Data for 1988–1990 are not comparable with prior years due to SIC code changes.

[c] Not published on the 1972 SIC code.

n.a. Not available.

Source: California Employment Development Department.

(Official U.S. Bureau of Labor Statistics series. The text portion of the report uses the interim series prepared by the Department of Finance.)

TABLE 8
AEROSPACE EMPLOYMENT IN CALIFORNIA, 1960–90 [a]
(In thousands)

Year and month	Total aerospace	Office computing and accounting machines	Radio and TV receiving equipment	Communi-cation equipment	Electronic components and accessories	Aircraft and parts	Guided missiles and space vehicles	Measuring and controlling instruments
1960	422.5	23.3	9.9	92.2	29.1	181.4	68.4	18.2
1961	425.8	23.6	10.6	98.8	31.2	166.0	76.2	19.5
1962	457.6	25.4	12.0	112.0	35.4	161.0	89.6	22.1
1963	458.3	25.6	11.9	110.4	34.8	160.1	93.7	21.8
1964	433.5	26.9	11.0	98.1	32.4	153.6	90.8	20.8
1965	434.3	30.2	10.8	95.7	34.9	155.3	86.0	21.4
1966	495.0	33.8	13.7	103.3	47.7	181.3	92.1	23.1
1967	542.4	38.8	15.0	117.6	52.0	198.6	97.4	23.0
1968	544.3	42.7	15.5	117.0	52.4	195.4	96.9	24.6
1969	528.3	53.4	16.7	114.4	57.7	178.3	82.6	25.3
1970	466.3	58.3	15.1	102.9	53.0	148.3	64.5	24.3
1971	409.6	52.3	14.2	91.1	45.9	130.3	52.9	23.0
1972	427.4	52.1	15.0	95.1	52.0	135.4	52.8	25.1
1973	462.8	61.4	15.5	100.0	68.9	135.6	51.0	30.5
1974	485.8	69.7	15.8	102.6	78.5	134.9	51.7	32.7
1975	450.5	63.3	14.9	103.0	65.7	121.3	52.0	30.2
1976	449.6	62.3	16.1	105.4	74.8	108.5	50.0	32.5
1977	465.2	67.0	16.6	108.4	82.3	109.4	48.0	33.5
1978	518.8	80.1	17.8	119.1	97.3	117.5	49.6	37.4
1979	590.6	92.2	18.0	129.6	114.6	140.4	54.0	41.9
1980	632.6	97.9	17.6	137.3	124.2	151.0	58.6	46.0
1981	647.1	98.4	17.3	146.5	126.1	147.9	62.7	48.2
1982	658.3	103.9	14.9	157.2	131.0	137.3	66.4	47.6
1983	672.0	109.9	13.5	158.7	139.8	133.3	69.3	47.5
1984	730.0	117.9	13.7	167.2	165.3	141.1	73.8	51.1
1985	753.7	111.4	13.6	179.1	160.8	156.7	78.1	54.1
1986	752.0	107.2	14.0	179.5	148.6	167.4	81.0	54.3
1987	752.2	105.8	14.5	174.3	150.4	171.6	81.1	54.5

		Aerospace			Electronics			
	Total	Aircraft and parts	Missiles and space vehicles	Navigation and guidance instruments	Office and computing machines	Communi-cations equipment	Electronic components	Laboratory measuring, controlling instruments
1988	725.5	163.6	81.9	126.7	102.9	31.7	147.8	70.9
1989	718.0	165.6	79.9	114.5	105.7	32.5	146.5	73.3
1990	692.8	165.4	78.1	101.9	104.1	30.7	142.0	70.5

[a] Data from 1960 through 1971 calculated using aerospace categories as defined by 1972 SIC codes. Data from 1972 through 1987 represent the official benchmarked aerospace series based upon the 1972 SIC codes. Beginning with 1988, data are based on the 1987 SIC codes. (Official U.S. Bureau of Labor Statistics series. The text portion of the report uses the interim series prepared by the Department of Finance.)

Source: California Employment Development Department.

TABLE 9

AVERAGE WEEKLY AND HOURLY EARNINGS AND AVERAGE HOURS WORKED PER WEEK, PRODUCTION AND RELATED WORKERS IN MANUFACTURING, CALIFORNIA AND UNITED STATES, 1960–90 [a]

	California			United States		
Year	Average weekly earnings	Average hourly earnings	Average hours per week	Average weekly earnings	Average hourly earnings	Average hours per week
1960	$104.28	$2.62	39.8	$89.72	$2.26	39.7
1961	108.53	2.72	39.9	92.34	2.32	39.8
1962	112.44	2.79	40.3	96.15	2.38	40.4
1963	115.78	2.88	40.2	99.22	2.45	40.5
1964	119.29	2.96	40.3	102.97	2.53	40.7
1965	123.83	3.05	40.6	107.53	2.61	41.2
1966	128.93	3.16	40.8	112.34	2.72	41.3
1967	132.92	3.29	40.4	114.49	2.82	40.6
1968	138.63	3.44	40.3	122.51	3.01	40.7
1969	145.89	3.62	40.3	129.51	3.19	40.6
1970	150.48	3.80	39.6	133.33	3.35	39.8
1971	158.79	4.02	39.5	142.44	3.57	39.9
1972	170.43	4.25	40.1	154.71	3.82	40.5
1973	178.93	4.44	40.3	166.46	4.09	40.7
1974	188.97	4.76	39.7	177.20	4.43	40.0
1975	205.67	5.22	39.4	190.30	4.83	39.4
1976	221.92	5.59	39.7	208.80	5.22	40.0
1977	240.60	6.00	40.1	228.50	5.67	40.3
1978	257.84	6.43	40.1	249.27	6.17	40.4
1979	280.50	7.03	39.9	269.34	6.70	40.2
1980	304.15	7.70	39.5	288.62	7.27	39.7
1981	338.98	8.56	39.6	318.00	7.99	39.8
1982	362.21	9.24	39.2	330.26	8.49	38.9
1983	380.80	9.52	40.0	354.08	8.83	40.1
1984	393.73	9.77	40.3	374.03	9.19	40.7
1985	406.82	10.12	40.2	386.37	9.54	40.5
1986	417.51	10.36	40.3	396.01	9.73	40.7
1987	433.23	10.75	40.3	406.31	9.91	41.0
1988	439.56	10.80	40.7	418.40	10.18	41.1
1989	454.21	11.16	40.7	430.09	10.49	41.0
1990	466.09	11.48	40.6	442.27 [b]	10.84 [b]	40.8 [b]

[a] Averages are based upon data for full-time and part-time production and related workers in production and other departments, such as shipping, maintenance, and warehousing. Overtime pay and premium wages for late-shift work are included.

[b] Preliminary data.

Source: California Employment Development Department; U.S. Department of Labor, Bureau of Labor Statistics.

TABLE 10
AVERAGE WEEKLY AND HOURLY EARNINGS AND AVERAGE HOURS WORKED PER WEEK IN SELECTED NONMANUFACTURING INDUSTRIES, CALIFORNIA, 1990 [a]

Industry	Average weekly earnings	Average hourly earnings	Average hours per week
Mineral extraction			
Oil and gas extraction	$733.98	$17.27	42.5
Nonmetallic minerals, except fuels	665.44	16.27	40.9
Contract construction			
General building contractors	711.50	19.44	36.6
Heavy construction contractors, except building	793.35	20.50	38.7
Special trade contractors	668.47	18.83	35.5
Transportation and Utilities			
Electric, gas, and sanitary services	755.33	19.67	38.4
Trade			
Wholesale	471.42	12.15	38.8
Retail (excluding eating/drinking)	259.26	8.70	29.8
Services			
Motion picture production	760.94	19.92	38.2

[a] Averages are based upon data for full-time and part-time production and related workers in mineral extraction, construction, workers in construction and nonsupervisory employees and working supervisors in other industries. Overtime hours and pay and premium wages for late-shift work are included.

Source: California Employment Development Department.

TABLE 11
PERSONAL INCOME IN CALIFORNIA, TOTAL AND PER CAPITA, 1960–90

Year	Total			Per capita [a] [d]		
	Amount (In millions)	Percent change	Percent of U.S.	Amount	Percent change	Percent of U.S. average
1960	$44,207	—	10.9	$2,786	—	123.6
1961	46,862	6.0	11.1	2,841	2.0	123.0
1962	50,580	7.9	11.2	2,963	4.3	122.3
1963	54,129	7.0	11.4	3,064	3.4	122.1
1964	58,691	8.4	11.6	3,233	5.5	122.0
1965	62,779	7.0	11.5	3,378	4.5	119.3
1966	68,322	8.8	11.5	3,623	7.3	118.9
1967	73,590	7.7	11.5	3,838	5.9	118.6
1968	80,647	9.6	11.5	4,158	8.3	118.3
1969	88,401	9.6	11.5	4,485	7.9	117.8
1970	95,039	7.5	11.5	4,746	5.8	117.2
1971	100,865	6.1	11.4	4,958	4.5	115.4
1972	110,341	9.4	11.3	5,360	8.1	114.9
1973	121,784	10.4	11.1	5,836	8.9	112.6
1974	136,194	11.8	11.3	6,433	10.2	113.9
1975	149,700	9.9	11.4	6,951	8.1	114.5
1976	167,708	12.0	11.6	7,646	10.0	115.0
1977	187,133	11.6	11.7	8,373	9.5	114.8
1978	214,938	14.9	11.9	9,411	12.4	115.7
1979	244,775	13.9	12.1	10,526	11.8	116.5
1980	276,107	12.8	12.2	11,603	10.2	117.0
1981	308,731	11.8	12.3	12,723	9.7	116.2
1982	328,033	6.3	12.3	13,236	4.0	115.3
1983	352,438	7.4	12.4	13,927	5.2	115.1
1984	389,183	10.4	12.5	15,098	8.4	115.1
1985	422,608	8.6	12.7	16,035	6.2	115.4
1986	453,110	7.2	12.9	16,782	4.7	115.0
1987	490,846	8.3	13.1	17,749	5.8	115.1
1988	535,721	9.1	13.2	18,915	6.6	114.5
1989 [b]	579,189	8.1	13.3	19,929	5.4	113.3
1990 [c]	622,525	7.5	13.5	20,847	4.6	113.0

[a] Per capita estimates derived using population estimates of the California Department of Finance.

[b] Reflects October 1989 Loma Prieta earthquake.

[c] Estimated.

[d] Population figures are not benchmarked to the 1990 census.

Source: U.S. Department of Commerce, Bureau of Economic Analysis, and California Department of Finance.

TABLE 12
PERSONAL INCOME BY MAJOR SOURCES, CALIFORNIA, 1960–90
(Dollars in millions)

Year	Total personal income [a]	Wages and salaries	Other labor income	Proprietor		Property income	Transfer payments	Less: Contributions for social insurance	Residence adjustment
				Farm	Nonfarm				
1960	$44,207	$29,168	$1,106	$865	$4,794	$6,333	$3,121	$1,085	−$95
1961	46,862	30,770	1,204	806	5,102	6,634	3,601	1,171	−84
1962	50,580	33,260	1,354	905	5,421	7,166	3,832	1,277	−82
1963	54,129	35,674	1,531	852	5,631	7,770	4,221	1,479	−71
1964	58,691	38,273	1,758	999	6,156	8,576	4,592	1,592	−71
1965	62,779	40,751	1,948	915	6,409	9,419	5,068	1,712	−18
1966	68,322	44,914	2,164	1,006	6,709	10,093	5,679	2,225	−18
1967	73,590	48,141	2,333	921	7,035	10,837	6,860	2,521	−16
1968	80,647	52,824	2,723	1,059	7,712	11,290	7,844	2,785	−18
1969	88,401	57,917	3,108	966	8,053	12,494	9,035	3,154	−18
1970	95,039	61,230	3,473	979	8,219	13,520	10,978	3,353	−7
1971	100,865	63,908	3,802	965	8,872	14,244	12,637	3,564	2
1972	110,341	69,895	4,486	1,391	9,987	15,031	13,716	4,174	9
1973	121,784	76,904	5,100	2,021	10.853	16,849	15,172	5,135	21
1974	136,194	84,419	5,903	2.549	11,769	18,977	17,919	5,376	34
1975	149,700	90,834	7,038	2,003	13,280	19,810	22,288	5,731	178
1976	167,708	100,631	8,515	2,042	16,217	21,722	24,852	6,562	290
1977	187,133	112,559	10,424	2,110	18,093	24,312	26,859	7,373	149
1978	214,938	128,656	12,150	2,391	20,947	29,596	29,157	8,092	132
1979	244,775	146,684	14,006	3,246	22,695	35,577	32,119	9,664	112
1980	276,107	163,730	16,110	4,108	22,249	42,294	37,393	9,881	104
1981	308,731	182,172	17,706	3,550	21,344	52,025	43,659	11,885	161
1982	328,033	193,183	19,661	2,949	21,419	55,579	47,895	12,827	172
1983	352,438	207,021	21,546	2,967	25,401	59,218	50,638	14,556	203
1984	389,183	229,740	23,094	3,549	29,642	66,935	52,252	16,252	223
1985	422,608	250,463	24,158	4,013	32,768	71,780	57,691	18,532	267
1986	453,110	269,725	25,961	4,723	36,302	74,870	61,589	20,294	233
1987	490,846	294,712	27,875	5,651	41,667	77,859	64,974	22,084	193
1988	535,721	319,565	30,285	6,268	46,405	88,154	69,766	24,949	227
1989 [b]	579,189	342,114	32,809	5,586	49,498	101,006	75,532	27,672	315
1990 [c]	622,525	366,943	34,929	5,519	54,147	108,030	82,506	29,924	375

[a] Detail may not add to total because of rounding.

[b] Reflects October 1989 Loma Prieta earthquake.

[c] Estimated.

Source: U.S. Department of Commerce, Bureau of Economic Analysis, and California Department of Finance.

TABLE 13
DISPOSABLE PERSONAL INCOME, CALIFORNIA 1960–89

	Disposable personal income		Per capita disposable income	
	Amount (In millions)	Percent change	Amount	Percent change
1960	$38,551	—	$2,429	—
1961	40,875	6.0	2,478	2.0
1962	44,022	7.7	2,579	4.1
1963	47,103	7.0	2,666	3.4
1964	51,957	10.3	2,862	7.4
1965	55,584	7.0	2,991	4.5
1966	60,093	8.1	3,187	6.6
1967	64,452	7.3	3,361	5.5
1968	69,774	8.3	3,598	7.1
1969	75,674	8.5	3,839	6.7
1970	82,712	9.3	4,131	7.6
1971	88,578	7.1	4,354	5.4
1972	94,949	7.2	4,613	5.9
1973	106,005	11.6	5,080	10.1
1974	118,249	11.6	5,585	9.9
1975	131,533	11.2	6,107	9.3
1976	145,806	10.9	6,647	8.8
1977	161,575	10.8	7,229	8.8
1978	184,885	14.4	8,095	12.0
1979	209,087	13.1	8,991	11.1
1980	235,003	12.4	9,875	9.8
1981	262,962	11.9	10,837	9.7
1982	280,812	6.8	11,331	4.6
1983	303,927	8.2	12,010	6.0
1984	335,105	10.3	13,000	8.2
1985	361,967	8.0	13,734	5.6
1986	387,009	6.9	14,334	4.4
1987	413,831	6.9	14,964	4.4
1988	454,833	9.9	16,059	7.3
1989[a]	487,655	7.2	16,779	4.5

[a] Reflects October 1989 Loma Prieta earthquake.

Source: U.S. Department of Commerce, Bureau of Economic Analysis.

TABLE 14
INDUSTRIAL SOURCES OF EARNINGS, CALIFORNIA AND UNITED STATES, 1987–89
(Percent)

Industry	California			United States		
	1987	1988	1989	1987	1988	1989
Total [a]	100.0	100.0	100.0	100.0	100.0	100.0
Farming	2.1	2.0	1.8	1.7	1.6	1.6
Mining	0.5	0.6	0.5	1.1	1.1	1.0
Construction	6.6	6.7	6.7	6.3	6.4	6.2
Manufacturing	18.6	18.3	18.0	20.4	20.2	19.7
Transportation, communication, and public utilities	6.0	5.8	5.8	6.8	6.7	6.6
Trade	15.6	15.8	15.9	15.9	16.0	16.0
Finance, insurance, real estate	8.2	7.7	7.4	7.7	7.4	7.0
Services	26.6	27.4	28.1	23.8	24.6	25.5
Government	15.1	14.8	15.0	15.7	15.5	15.7
Other [b]	0.9	0.9	0.9	0.6	0.6	0.6

[a] Consists of wage and salary disbursements, other labor income and proprietors' income. Detail may not add to total due to rounding.

[b] Agricultural services, forestry, fisheries and other.

Source: Computed by California Department of Finance from data reported by the U.S. Department of Commerce, Bureau of Economic Analysis.

TABLE 15

NUMBER OF PERSONAL INCOME TAX RETURNS, ADJUSTED GROSS INCOME TAXABLE INCOME, AND TAX ASSESSED, 1960–88

(Dollars in thousands)

Income year [a]	Number of returns	Adjusted gross income	Taxable income	Tax assessed
1960	4,239,099	$31,234,015	$13,337,516	$256,450,535
1961	4,454,831	33,581,594	14,624,977	290,676,930
1962	4,558,688	35,878,383	15,833,652	304,396,656
1963	4,851,770	38,835,003	17,382,196	338,006,936
1964	4,981,588	42,133,398	19,411,712	391,744,625
1965	5,167,529	45,234,006	21,088,900	432,886,449
1966	5,445,732	48,692,542	23,442,015	478,765,378
1967	5,449,456	52,827,614	43,252,693	947,644,969
1968	5,334,038	56,636,453	44,663,419	1,061,700,536
1969	5,586,849	60,874,377	47,983,889	1,088,914,303
1970	5,554,362	63,189,993	49,434,451	1,212,386,611
1971	5,690,817	67,784,603	52,618,643	1,132,505,465
1972	6,972,468	78,371,548	60,904,375	1,691,312,440
1973	7,490,292	85,533,832	66,863,680	1,536,631,957
1974	7,929,997	93,727,065	73,916,530	2,360,763,630
1975	8,124,290	101,597,846	80,476,280	2,758,812,903
1976	8,620,249	115,605,336	91,731,547	3,359,556,988
1977	8,989,797	132,780,576	105,756,245	4,224,600,738
1978	9,448,710	149,103,646	119,658,733	4,174,010,707
1979	10,190,263	169,787,242	136,691,944	5,973,284,386
1980	10,335,674	189,296,755	150,455,416	6,205,907,550
1981	10,661,919	209,941,951	165,129,794	6,774,149,612
1982	10,721,424	224,864,258	175,605,697	7,240,834,538
1983	10,950,080	244,257,462	188,843,751	8,424,611,422
1984	11,630,329	290,103,630	229,858,627	9,817,265,664
1985	11,857,200	306,005,694	240,023,248	10,636,087,730
1986	12,241,172	340,363,750	266,290,027	12,586,418,855
1987	12,649,850	382,328,602	316,237,052	12,872,148,386
1988	13,184,346	425,656,203	356,204,569	15,048,753,047

[a] Changes in the Personal Income Tax Law effective with returns for the 1987 income year make prior year information not comparable.

Source: California Franchise Tax Board.

TABLE 16
PERSONAL INCOME TAX STATISTICS, BY COUNTY, 1988 INCOME YEAR

County	All returns—taxable and nontaxable			Joint returns		Tax assessed (Thousands)
	Number of returns	Adjusted gross income (Thousands)	Median income	Number of returns	Median income	
Alameda	538,255	$16,821,213	$22,443	207,651	$42,548	$574,585
Alpine	236	5,667	19,250	126	31,000	180
Amador	10,496	270,079	19,895	6,092	29,562	7,194
Butte	64,594	1,358,507	14,949	31,583	25,805	38,493
Calaveras	9,721	249,708	18,584	5,742	27,113	6,621
Colusa	6,514	142,341	14,144	3,494	21,809	4,256
Contra Costa	330,127	12,816,481	26,521	151,490	47,320	496,064
Del Norte	6,806	138,923	15,132	3,609	25,019	3,144
El Dorado	44,295	1,238,163	20,623	24,084	32,699	34,130
Fresno	238,542	5,456,476	14,428	111,415	26,488	160,724
Glenn	9,131	189,219	14,745	4,809	24,025	4,491
Humboldt	44,224	1,013,267	16,274	20,910	29,610	28,066
Imperial	42,421	809,329	10,846	23,974	15,626	21,559
Inyo	7,573	189,125	17,225	3,825	29,391	5,638
Kern	182,437	4,593,015	17,179	91,383	30,044	132,266
Kings	28,806	615,507	15,428	15,126	25,017	15,051
Lake	17,360	360,301	15,069	9,355	23,147	8,364
Lassen	8,248	195,471	19,498	4,650	29,838	4,592
Los Angeles	3,391,904	104,454,605	18,667	1,284,547	34,405	3,947,932
Madera	29,008	638,681	15,008	15,967	25,276	16,019
Marin	93,571	4,380,166	25,674	35,247	53,147	213,558
Mariposa	5,277	115,660	16,067	2,713	25,324	2,799
Mendocino	30,504	686,761	15,990	14,791	27,495	18,287
Merced	57,824	1,189,779	14,219	29,970	23,429	29,388
Modoc	2,900	60,589	16,110	1,641	24,833	1,517
Mono	3,570	98,840	17,855	1,455	32,904	3,344
Monterey	122,782	3,400,332	17,701	56,603	29,782	109,447
Napa	43,647	1,375,896	21,212	20,475	36,533	47,546
Nevada	27,122	743,180	19,896	15,075	30,213	21,616
Orange	1,008,172	35,901,074	22,638	431,630	43,181	1,367,444
Placer	67,759	2,095,029	22,664	36,262	37,720	63,851
Plumas	7,027	165,556	17,835	3,962	28,497	4,166
Riverside	359,078	10,024,390	19,234	183,955	32,270	293,669
Sacramento	402,422	11,163,800	20,599	172,793	36,583	336,715
San Benito	13,420	352,004	17,358	6,762	31,026	10,150
San Bernardino	443,426	12,280,028	20,884	221,873	35,055	331,048
San Diego	940,682	27,221,652	19,527	410,951	34,950	929,630
San Francisco	361,688	10,917,542	19,380	97,113	32,837	452,506
San Joaquin	170,014	4,261,059	17,422	81,329	31,739	124,795
San Luis Obispo	77,815	2,086,975	18,731	38,011	31,837	61,753
San Mateo	282,797	11,415,336	25,615	116,724	46,580	482,459
Santa Barbara	144,486	4,516,310	19,468	63,116	35,258	163,089
Santa Clara	657,524	23,955,071	25,442	268,774	47,647	919,704
Santa Cruz	101,151	2,863,476	18,160	42,699	33,794	94,782
Shasta	52.896	1,296,234	17,113	28,348	28,360	36,458

TABLE 16—Continued
PERSONAL INCOME TAX STATISTICS, BY COUNTY, 1988 INCOME YEAR

	All returns—taxable and nontaxable			Joint returns		
County	Number of returns	Adjusted gross income (Thousands)	Median income	Number of returns	Median income	Tax assessed (Thousands)
Sierra	1,162	$26,945	$19,644	636	$28,571	$633
Siskiyou	16,382	340,873	15,658	8,806	24,836	8,201
Solano	120,467	3,562,610	24,204	59,809	39,898	96,586
Sonoma	159,325	4,364,982	20,936	71,297	37,315	152,028
Stanislaus	133,417	3,320,207	16,894	66,461	29,693	98,019
Sutter	23,017	534,413	15,737	12,223	26,331	14,666
Tehama	15,452	314,494	15,215	8,434	24,031	7,082
Trinity	4,411	99,149	16,770	2,517	24,977	2,565
Tulare	100,670	2,071,483	13,300	53,169	22,299	51,259
Tuolumne	17,453	422,647	18,054	9,540	28,219	10,845
Ventura	262,436	8,759,473	22,616	126,659	41,103	296,032
Yolo	54,185	1,460,314	17,357	23,706	33,422	44,179
Yuba	17,941	331,641	13,794	9,263	22,424	6,784
Unallocated [1]	187,008	4,815,046	15,575	71,652	32,132	135,539
Resident Out of State [2]	109,890	4,100,396	19,454	43,965	35,438	183,798
Nonresident	243,237	20,186,635	27,970	136,323	41,372	198,639
Totals:						
58 Counties	11,414,570	$349,732,048	—	4,854,624	—	$12,417,969
All	11,954,705	$378,834,125	$20,010	5,106,564	$35,962	$12,935,945

[1] Unable to determine county of residence from tax returned.

[2] Resident returns filed with out-of-state address.

Source: California Franchise Tax Board.

TABLE 17
CONSUMER PRICE INDEX, UNITED STATES, CALIFORNIA, LOS ANGELES, SAN FRANCISCO, AND SAN DIEGO, 1970–90
(1982–84 = 100)

Year	United States	California [a]	Los Angeles-Long Beach [b]	San Francisco-Oakland [c]	San Diego [d]
All Urban Consumers					
1970	38.8	37.9	38.7	37.7	34.1
1971	40.5	39.3	40.1	39.1	35.4
1972	41.8	40.6	41.4	40.4	36.8
1973	44.4	43.0	43.7	42.8	39.2
1974	49.3	47.4	48.2	47.0	43.5
1975	53.8	52.3	53.3	51.8	47.6
1976	56.9	55.6	56.9	54.6	50.5
1977	60.6	59.5	60.8	58.8	53.8
1978	65.2	64.4	65.3	64.3	59.2
1979	72.6	71.3	72.3	69.8	68.9
1980	82.4	82.4	83.7	80.4	79.4
1981	90.9	91.4	91.9	90.8	90.1
1982	96.5	97.3	97.3	97.6	96.2
1983	99.6	98.9	99.1	98.4	99.0
1984	103.9	103.8	103.6	104.0	104.8
1985	107.6	108.6	108.4	108.4	110.4
1986	109.6	112.0	111.9	111.6	113.5
1987	113.6	116.6	116.7	115.4	117.5
1988	118.3	121.9	122.1	120.5	123.4
1989	124.0	128.0	128.3	126.4	130.6
1990	130.7	135.0	135.9	132.1	138.4
Urban Wage Earners and Clerical Earners					
1970	39.0	38.2	38.7	38.0	35.8
1971	40.7	39.6	40.1	39.4	37.1
1972	42.1	40.9	41.4	40.8	38.6
1973	44.7	43.3	43.7	43.2	41.1
1974	49.6	47.7	48.2	47.4	45.6
1975	54.1	52.6	53.3	52.2	49.9
1976	57.2	55.9	56.8	55.2	52.9
1977	60.9	59.9	60.8	59.4	56.4
1978	65.6	64.7	65.1	64.8	61.9
1979	73.1	72.1	72.8	70.5	71.4
1980	82.9	83.6	84.7	81.2	82.1
1981	91.4	92.7	93.1	91.6	92.8
1982	96.9	98.5	98.5	98.2	99.4
1983	99.8	99.0	99.3	98.2	99.0
1984	103.3	102.5	102.2	103.7	101.7
1985	106.9	106.7	106.5	107.8	104.5
1986	108.6	109.6	109.5	110.7	107.2
1987	112.5	113.9	114.0	114.3	111.1
1988	117.0	118.9	119.0	119.4	116.5
1989	122.6	124.9	124.9	125.5	123.5
1990	129.0	131.5	131.9	131.1	130.5

[a] Computed by the Department of Industrial Relations, Division of Labor Statistics and Research as a weighted average of the indexes for Los Angeles-Long Beach, San Francisco-Oakland, and from 1965–86, San Diego.

[b] 1978–86: Los Angeles and Orange counties. Starting with 1987, Riverside, San Bernardino, and Ventura counties are also included.

[c] 1978–86: Alameda, Contra Costa, Marin, San Francisco, and San Mateo counties. Starting with 1987, Napa, Santa Clara, Santa Cruz, Solano, and Sonoma counties are also included.

[d] San Diego County.

Source: U.S. Department of Labor, Bureau of Labor Statistics and California Department of Industrial Relations.

TABLE 18

CALIFORNIA CASH FARM INCOME, NONCASH INCOME, INVENTORY ADJUSTMENT, PRODUCTION EXPENSES AND INCOME, 1960–89

(Dollars in millions)

Year	Cash farm income [a]	Noncash income [b]	Inventory adjustment	Gross farm income [c]	Production expense	Net farm income
1960	$3,271	$134	$45	$3,450	$2,476	$974
1961	3,317	146	−5	3,458	2,577	881
1962	3,485	143	87	3,715	2,758	957
1963	3,582	146	3	3,731	2,827	904
1964	3,747	149	15	3,911	2,842	1,069
1965	3,803	154	60	4,017	3,043	974
1966	4,188	156	−40	4,304	3,212	1,092
1967	4,096	150	17	4,263	3,297	966
1968	4,452	151	39	4,642	3,474	1,168
1969	4,656	154	−62	4,749	3,661	1,088
1970	4,717	152	−16	4,854	3,828	1,025
1971	5,028	161	21	5,210	4,193	1,017
1972	5,698	171	15	5,884	4,324	1,560
1973	7,401	192	160	7,753	5,197	2,556
1974	8,678	223	162	9,063	6,197	2,866
1975	8,587	265	81	8,933	6,599	2,334
1976	9,214	291	−25	9,479	7,231	2,248
1977	9,623	295	6	9,924	7,584	2,340
1978	10,846	340	−19	11,166	8,536	2,631
1979	13,067	466	208	13,741	10,034	3,707
1980	14,116	581	211	14,907	10,809	4,098
1981	14,205	688	614	15,506	11,476	4,030
1982	14,872	783	−449	15,206	12,003	3,203
1983	13,818	801	−124	14,495	11,936	2,558
1984	14,984	796	304	16,084	12,179	3,905
1985	14,947	648	136	15,731	11,771	3,960
1986	15,509	556	−434	15,632	11,475	4,157
1987	16,605	605	12	17,221	11,639	5,582
1988	17,301	616	26	17,943	11,802	6,141
1989	18,288	597	20	18,905	12,942	5,963

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[a] Receipts from marketings plus government payments, other farm income and nonmoney income.

[b] Value of home consumption and gross rental value of farm dwellings.

[c] Net farm income before adjustment plus net change in inventories. May not total due to rounding.

Source: United States Department of Agriculture, Economic Research Service.

TABLE 19

CALIFORNIA CASH FARM INCOME, ALL CROPS, LIVESTOCK AND POULTRY, OTHER FARM INCOME, AND GOVERNMENT PAYMENTS, 1960–89

(Dollars in millions)

Year	Cash farm income[a]	All crops	Livestock and poultry	Other farm related income [b]	Government payments
1960	$3,271	$1,976	$1,246	$27	$22
1961	3,317	1,985	1,278	26	28
1962	3,485	2,081	1,344	28	32
1963	3,582	2,170	1,350	30	32
1964	3,747	2,369	1,309	35	34
1965	3,803	2,295	1,427	40	41
1966	4,188	2,477	1,565	42	104
1967	4,096	2,374	1,564	48	110
1968	4,452	2,679	1,621	51	101
1969	4,656	2,711	1,768	54	123
1970	4,717	2,718	1,815	52	132
1971	5,028	2,980	1,876	59	113
1972	5,698	3,430	2,086	60	122
1973	7,401	4,659	2,563	73	106
1974	8,678	5,796	2,786	78	18
1975	8,587	5,674	2,800	97	16
1976	9,214	6,173	2,923	105	13
1977	9,623	6,495	2,947	106	75
1978	10,846	7,302	3,381	107	57
1979	13,067	8,658	4,227	122	61
1980	14,116	9,899	4,089	115	14
1981	14,205	9,839	4,219	124	23
1982	14,872	10,089	4,393	255	135
1983	13,818	9,015	4,213	237	353
1984	14,984	9,891	4,529	229	335
1985	14,947	9,955	4,348	342	302
1986	15,509	10,372	4,463	286	388
1987	16,605	11,385	4,442	316	462
1988	17,301	11,970	4,682	314	335
1989	18,288	12,422	5,093	401	372

[a] Receipts from marketings plus government payments and other farm income (may not total due to rounding).

[b] Includes forest product sales, recreational income and other farm business related income. Estimates for 1982 and later include income from custom feeding services.

Source: United States Department of Agriculture, Economic Research Service.

TABLE 20
CALIFORNIA CASH FARM RECEIPTS FROM CROPS, 1960–89
(Dollars in millions)

Year	All crops	Fruits and nuts	Vegetables	Field crops	Nursery products
1960	$1,976	$586	$448	$830	$112
1961	1,985	587	475	804	119
1962	2,081	601	522	826	132
1963	2,170	647	505	879	139
1964	2,369	724	563	917	165
1965	2,295	631	594	900	170
1966	2,477	712	690	893	182
1967	2,374	666	713	807	188
1968	2,679	786	855	842	196
1969	2,711	848	782	864	217
1970	2,718	824	771	889	234
1971	2,980	935	915	884	246
1972	3,430	1,018	1,050	1,071	291
1973	4,659	1,554	1,191	1,549	365
1974	5,796	1,503	1,490	2,382	421
1975	5,674	1,507	1,633	2,064	470
1976	6,173	1,608	1,589	2,427	549
1977	6,495	2,017	1,889	2,001	588
1978	7,302	2,555	2,125	1,957	665
1979	8,658	3,151	2,232	2,470	805
1980	9,899	3,252	2,557	3,184	906
1981	9,839	3,182	2,846	2,871	940
1982	10,089	3,416	2,734	2,995	944
1983	9,015	2,718	2,952	2,328	1,017
1984	9,891	3,246	3,113	2,287	1,245
1985	9,955	3,344	2,892	2,425	1,294
1986	10,372	3,661	3,173	2,200	1,338
1987	11,385	4,118	3,556	2,247	1,464
1988	11,970	4,539	3,402	2,481	1,548
1989	12,422	4,513	3,705	2,618	1,586

Source: United States Department of Agriculture, Economic Research Service.

TABLE 21
AGRICULTURAL EMPLOYMENT IN CALIFORNIA, 1972–90

Year and month	Total wage and salary employment	Agricultural production	Agricultural services [a]
1972	268.1	208.3	59.8
1973	288.9	222.4	66.6
1974	308.1	236.9	71.2
1975	315.7	243.7	72.0
1976	323.5	248.2	75.3
1977	314.7	241.7	72.9
1978	323.9	245.1	78.9
1979	338.6	253.6	85.0
1980	352.3	261.9	90.3
1981	354.4	258.6	95.8
1982	358.9	260.7	98.3
1983	347.3	250.3	97.1
1984	347.3	248.6	98.7
1985	335.4	232.7	102.7
1986	327.6	222.0	105.6
1987	345.0	227.2	117.8
1988	369.3	239.2	130.1
1989	371.4	233.7	137.7
1990	360.1	232.8	127.3
1990 January	270.3	173.8	96.5
February	267.1	175.4	91.7
March	294.2	194.9	99.3
April	346.9	227.4	119.5
May	400.6	256.7	143.9
June	429.4	274.1	155.3
July	417.6	269.2	148.4
August	435.0	284.0	151.0
September	450.1	294.5	155.6
October	384.8	251.4	133.4
November	316.5	200.2	116.3
December	309.2	192.4	116.8

[a] Agricultural services includes forestry and fishing, but excludes veterinary, other animal, and landscape and horticultural services.

Source: California Employment Development Department (Official U.S. Bureau of Labor Statistics series. The text portion of the report uses the interim series prepared by the Department of Finance.)

TABLE 22
CORPORATE INCOME REPORTED FOR STATE TAXATION, 1960–88

Year [b]	Number of corporations [a]				Income reported for state taxation (In millions)		
	Total	With net income	With net loss	No income or loss	Total	Net income [c]	Net loss [d]
1960	101,081	56,987	28,743	15,351	$3,517	$4,182	$−665
1961	105,645	59,746	31,802	14,097	3,717	4,509	−792
1962	110,294	63,400	31,954	14,940	3,970	4,754	−784
1963	114,667	66,496	33,667	14,504	4,283	5,092	−809
1964	118,860	69,555	34,254	15,051	4,626	5,526	−900
1965	122,399	71,484	35,625	15,290	5,126	6,007	−881
1966	124,690	73,076	35,664	15,950	5,643	6,638	−995
1967	125,677	73,433	38,188	14,056	5,252	6,456	−1,203
1968	128,505	77,238	36,754	14,513	6,003	7,255	−1,251
1969	136,695	80,348	38,627	17,720	5,643	7,477	−1,834
1970	145,352	81,340	44,318	19,694	4,386	6,712	−2,326
1971	151,216	83,664	47,621	19,931	4,804	7,249	−2,445
1972	158,932	91,055	47,214	20,663	6,465	8,561	−2,096
1973	165,676	97,377	46,937	21,362	7,911	10,208	−2,296
1974	172,185	102,680	49,962	19,543	8,978	11,734	−2,757
1975	177,665	106,213	53,965	17,487	8,362	11,672	−3,309
1976	184,326	113,614	54,249	16,463	11,916	14,808	−2,892
1977	200,393	124,175	57,949	18,269	14,941	17,830	−2,889
1978	221,527	138,495	63,725	19,307	18,728	21,974	−3,246
1979	248,188	154,468	72,343	21,377	20,735	24,826	−4,091
1980	275,493	165,183	86,482	23,828	20,654	25,825	−5,171
1981	299,215	172,122	101,398	25,695	16,367	24,214	−7,847
1982	326,264	175,054	120,964	30,246	10,745	22,828	−12,083
1983	337,165	184,408	125,149	27,614	16,485	26,628	−10,143
1984	397,854	208,566	149,831	39,456	19,349	31,742	−12,393
1985	388,244	207,388	139,408	41,448	21,120	34,308	−13,188
1986	414,602	216,677	149,684	48,241	25,457	40,043	−14,585
1987	464,186	245,505	164,933	53,748	29,719	45,619	−15,900
1988 [e]	448,486	229,226	165,917	53,343	32,372	50,753	−18,381

[a] Includes a slight amount of duplication as a result of mergers, consolidations, changes in corporate names and changes of income year which necessitated filing more than one state franchise tax return during the year. In 1961 this duplication amounted to approximately 205 corporations, or 0.5 percent of the total.

[b] Includes corporations with fiscal years ending in the calendar year shown.

[c] Income of all corporations reporting net income.

[d] Income of all corporations reporting net loss.

[e] 1988 income is not strictly comparable with prior years due to a change in data sources.

Source: California Franchise Tax Board.

TABLE 23
BANK AND CORPORATION FRANCHISE TAX RETURNS REPORTING NET INCOME SUBJECT TO STATE TAXATION, BY INDUSTRY, 1987 AND 1988
(Dollars in thousands)

	1987 Taxable Year				1988 Taxable Year [a]			
	Corporations reporting net income subject to state taxation		All reporting corporations		Corporations reporting net income subject to state taxation		All reporting corporations	
Industry	Number	Net income	Number	Net income less net loss	Number	Net income	Number	Net income less net loss
Agriculture, Forestry, and Fishery	5,305	$491,952	9,517	$289,280	5,970	$537,441	10,113	$284,294
Mining	1,179	$595,001	2,944	$119,408	872	$467,839	2,112	$174,908
Crude petroleum and natural gas production	748	293,661	1,759	−136,227	379	234,939	1,162	−21,141
Other mining and quarrying	431	301,340	1,185	255,635	493	232,900	950	196,049
Construction	20,014	$1,876,850	35,474	$1,230,764	18,792	$2,079,150	34,900	$1,660,916
Manufacturing	26,211	$14,596,724	48.123	$10,987,780	24,921	$16,941,394	45,969	$13,390,764
Beverages, food, and kindred products	1,476	1,656,144	2,926	1,450,937	1,157	1,412,538	1,861	1,323,331
Textile-mill products	316	39,366	440	39,290	367	253,384	524	182,121
Apparel and products made from fabric	1,419	351,194	2,597	238,541	1,290	398,357	2,397	307,920
Wood products, except furniture	591	281,722	1,239	225,800	768	521,908	1,330	452,170
Furniture and fixtures	916	132,200	1,516	42,468	409	118,049	1,075	102,707
Paper and allied products	646	269,879	1,274	198,050	816	462,632	1,831	335,398
Printing, publishing, and allied industries	3,139	1,048,839	5,497	950,280	2,919	990,717	5,273	730,173
Chemicals and allied products	1,291	1,357,889	1,844	1,275,648	1,203	1,608,222	2,071	1,521,198
Petroleum, coal, and rubber products	1,189	1,389,278	2,595	1,059,560	1,599	1,742,554	2,637	1,661,627
Stone, clay, and glass products	583	583,982	1,087	537,093	731	296,085	1,047	211,691
Primary metals	354	125,534	655	56,613	497	637,822	993	504,593
Electrical machinery and equipment	3,236	2,177,840	6,336	1,153,210	2,802	2,574,413	5,127	1,631,629
Transportation equipment	1,047	1,971,964	1,978	1,777,834	868	2,271,311	1,591	2,136,926
Other equipment	1,354	999,701	2,863	503,681	1,430	1,335,898	2,819	1,155,105
Precision equipment	981	799,366	2,185	516,564	986	565,439	2,027	230,703
Other fabricated metal products	5,511	931,888	8,046	757,031	4,295	972,468	7,122	614,156
Other manufacturing	2,162	479,938	5,045	205,180	2,784	779,597	6,244	289,316
Services	107,781	$4,593,845	200,542	$1,206,934	88,599	$4,567,832	178,994	$513,013
Motion picture production	4,675	176,506	9,194	−191,377	3,444	149,866	8,871	−565,674
Amusement services	4,966	498,363	10,548	275,516	4,857	633,742	9,912	439,586
Personal services	2,052	97,259	4,326	65,499	2,069	73,403	4,069	51,731
Business services	18,258	1,255,810	36,853	74,823	17,156	1,045,038	35,337	−36,828
Professional services	41,601	895,537	58,332	656,114	25,240	583,195	43,813	306,203
Other services	36,229	1,670,370	81,289	326,359	35,833	2,082,588	76,992	317,995

TABLE 23—Continued

BANK AND CORPORATION FRANCHISE TAX RETURNS REPORTING NET INCOME SUBJECT TO STATE TAXATION, BY INDUSTRY, 1987 AND 1988

(Dollars in thousands)

Industry	1987 Taxable Year				1988 Taxable Year [a]			
	Corporations reporting net income subject to state taxation		All reporting corporations		Corporations reporting net income subject to state taxation		All reporting corporations	
	Number	Net income	Number	Net income less net loss	Number	Net income	Number	Net income less net loss
Trade	47,768	$6,483,475	90,205	$3,290,589	50,698	$9,507,618	95,690	$5,892,022
Retail trade	26,309	3,166,856	48,567	1,710,771	26,681	3,730,989	51,698	2,386,215
Wholesale trade	21,459	3,316,619	41,638	1,579,818	24,017	5,776,629	43,992	3,505,807
Finance, Insurance, and Real Estate	31,218	$11,853,310	65,389	$7,856,468	34,335	$9,001,250	70,293	$3,864,021
Banks	216	1,304,808	450	962,936	347	1,273,233	634	982,252
Savings and loan assns & other financials	675	2,245,467	1,324	1,181,226	723	905,252	1,661	−484,327
Real estate companies	22,928	4,994,333	46,483	3,523,151	25,422	3,018,324	49,043	1,400,558
Investment and insurance companies	7,399	3,308,702	17,132	2,189,155	7,843	3,804,441	18,955	1,965,538
Utilities	6,029	$5,128,008	11,992	$4,737,669	5,039	$7,650,385	10,415	$6,592,434
Transportation	3,205	816,314	6,363	621,613	3,168	1,219,910	6,105	1,093,150
Communications	123	172,010	750	113,456	334	3,003,049	643	2,868,127
Radio and television industries	489	407,186	692	315,450	7	188,506	604	−302,106
Electric and gas utilities	858	3,627,068	1,409	3,609,110	260	3,037,245	474	3,000,642
Other public utilities	1,354	105,430	2,778	78,040	1,270	201,675	2,589	−67,379
Total	245,505	$45,619,165	464,186	$29,718,892	229,226	$50,752,909	448,486	$32,372,372

[a] 1988 income is not strictly comparable with prior years due to a change in data sources.

Source: California Franchise Tax Board.

TABLE 24

CALIFORNIA BUILDING PERMIT ACTIVITY: NONRESIDENTIAL VALUATION BY SELECTED TYPES OF CONSTRUCTION, 1963–90

(Dollars in thousands)

Year	Commercial	Industrial	Other	Additions and alterations	Total [b]
1963	$734,878	$198,932	$708,507	$280,024	$1,922,338
1964	749,998	184,849	805,449	261,022	2,001,317
1965	845,483	207,844	656,461	286,488	1,996,275
1966	829,974	255,348	706,425	307,759	2,099,504
1967	728,496	283,612	601,256	268,139	1,881,503
1968	869,419	367,027	651,423	271,259	2,159,126
1969	1,016,925	395,697	666,768	452,097	2,531,490
1970	1,089,054	288,077	674,969	491,669	2,543,764
1971	1,401,364	326,049	978,580	263,473	2,969,469
1972	1,437,511	464,702	865,306	281,118	3,048,634
1973	1,349,105	717,549	826,827	337,156	3,230,637
1974	1,260,018	736,532	902,675	359,502	3,258,723
1975	1,296,132	491,032	952,261	366,794	3,106,221
1976	1,327,749	629,515	1,067,335	443,049	3,467,649
1977	1,890,490	1,093,685	1,229,912	498,550	4,712,638
1978	2,477,474	1,556,132	1,318,691	606,069	5,958,365
1979	3,377,019	1,812,478	1,383,480	721,923	7,294,901
1980 [a]	3,274,077	1,276,735	1,202,941	1,716,358	7,470,107
1981	4,034,262	1,484,012	1,308,222	2,079,349	8,905,843
1982	4,176,487	1,051,366	1,401,367	2,100,651	8,729,875
1983	4,456,644	1,312,567	1,478,114	2,663,477	9,910,801
1984	5,644,100	2,020,400	1,560,600	2,743,500	11,968,600
1985	6,235,954	1,956,566	1,800,293	3,324,965	13,317,778
1986	5,742,452	2,134,394	1,887,069	3,401,499	13,165,415
1987	5,686,771	1,803,318	1,747,206	3,664,011	12,901,306
1988	6,568,580	1,802,032	1,769,095	4,020,603	14,160,310
1989	6,159,419	1,704,750	1,518,323	4,283,608	13,666,100
1990	5,244,879	1,598,458	1,634,563	4,235,365	12,713,265

[a] Prior to 1980 all additions and alterations of $100,000 or over were recorded as new construction in either the commercial, industrial or other category.

[b] Parts may not add to total due to rounding.

Source: Construction Industry Research Board.
Security Pacific National Bank through 1986.

TABLE 25
RESIDENTIAL HOUSING UNITS AUTHORIZED BY PERMITS, CALIFORNIA, 1963–90

Year	Single	Multiple	Total	Additions and alterations valuation (Millions)	Total residential valuation (Millions)
1963	131,544	190,472	322,016	$264	$4,066
1964	112,977	155,430	268,407	285	3,742
1965	95,156	82,426	177,582	280	2,910
1966	65,405	33,967	99,372	259	1,926
1967	68,417	43,575	111,992	260	2,108
1968	86,957	73,022	159,979	268	2,838
1969	80,134	104,211	184,345	267	3,148
1970	71,344	124,348	195,692	271	3,177
1971	113,260	143,729	256,989	303	4,529
1972	124,064	155,606	279,670	330	5,390
1973	102,571	113,508	216,079	350	4,883
1974	76,204	53,025	129,229	434	3,687
1975	89,823	41,909	131,732	529	4,541
1976	140,293	81,647	221,940	659	8,023
1977	174,874	95,766	270,640	840	10,494
1978	141,537	102,268	243,805	947	10,604
1979	127,499	82,577	210,076	1,103	10,791
1980	86,632	58,355	144,987	1,234	9,098
1981	59,973	44,900	104,873	1,235	7,520
1982	49,852	34,521	84,373	1,242	6,179
1983	99,299	69,059	168,358	1,493	11,511
1984	107,346	110,661	218,007	1,567	14,514
1985	109,809	153,873	263,682	1,683	17,599
1986	143,013	159,921	302,934	1,870	22,319
1987	136,128	117,043	253,171	2,164	22,116
1988	162,167	93,392	255,559	2,473	26,361
1989	162,651	75,096	237,747	2,968	27,790
1990	104,225	60,338	164,563	3,262	20,778

Source: Construction Industry Research Board.
Security Pacific National Bank through 1986.

TABLE 26
TAXABLE TRANSACTIONS IN CALIFORNIA AND OUTSTANDING SALES TAX PERMITS, BY TYPE OF OUTLET, 1960–1990

Calendar year	Taxable transactions		Sales tax permits outstanding[a]			
	All outlets (In millions)	Retail stores (In millions)	Total	Retail[b] stores	Personal service shops	Other[c]
1960	$23,361	$15,645	346,706	150,512	58,997	137,197
1961	23,987	16,077	351,540	148,899	59,516	143,125
1962	25,969	17,522	355,403	151,769	57,591	146,043
1963	27,892	18,893	362,614	154,517	57,105	150,992
1964	30,265	20,550	372,387	157,344	56,749	158,294
1965	31,908	21,516	381,203	161,109	56,002	164,092
1966	34,236	22,624	389,867	163,087	55,326	171,454
1967	35,122	23,512	392,705	163,821	54,624	174,260
1968	39,007	26,168	401,980	165,285	54,993	181,702
1969	42,378	28,254	411,375	167,887	55,066	188,422
1970	43,223	28,699	426,766	171,094	56,173	199,499
1971	46,815	31,496	440,935	173,343	57,359	210,233
1972	53,714	36,518	459,616	177,261	58,815	233,540
1973	61,738	42,119	474,733	180,330	59,943	234,460
1974	68,071	45,797	492,937	182,570	60,918	249,449
1975	73,476	49,800	520,499	187,399	62,951	270,149
1976	83,822	57,343	552,162	193,925	65,868	292,369
1977	99,482	67,491	583,704	200,452	69,271	313,981
1978	113,468	76,366	611,397	206,951	72,003	332,443
1979	131,678	87,270	642,152	212,804	75,185	354,163
1980	142,759	94,211	673,679	218,945	78,272	376,462
1981	155,127	101,666	698,080	223,201	79,952	394,927
1982	154,553	102,009	740,577	230,023	83,223	427,331
1983	169,413	113,350	764,815	233,522	85,697	445,596
1984	194,014	126,736	783,718	240,108	88,839	454,771
1985	208,574	135,901	808,549	246,878	92,465	469,206
1986	217,465	141,880	841,630	258,248	96,886	486,496
1987	231,870	150,252	867,132	271,330	100,689	495,113
1988	251,078	162,517	880,216	281,218	103,748	495,250
1989	272,089	175,766	898,222	290,982	106,253	500,987
1990	281,838	181,633	928,953	302,356	108,199	518,398

[a] Permits as of July 1.

[b] Exclusive of itinerant and mail-order vendors.

[c] Consists of manufacturing, wholesaling, contracting, and miscellaneous outlets and itinerant and mail-order vendors.

n.a. Not available.

Source: California State Board of Equalization.

TABLE 27
TAXABLE TRANSACTIONS IN CALIFORNIA BY TYPE OF BUSINESS, 1984–89
(Dollars in millions)

	1984	1985	1986 [d]	1987 [d]	1988 [d]	1989 [d]
Total, all outlets	$194,014	$208,574	$217,465	$231,870	$251,078	$272,089
Retail stores	126,736	135,901	141,880	150,252	162,517	175,766
Apparel stores	6,107	6,532	7,089	7,694	8,676	9,743
General merchandise and drug stores [a]	20,277	21,867	23,099	25,637	27,238	29,341
Specialty stores	14,642	15,636	16,298	18,321	20,270	22,303
Grocery stores [b]	11,832	12,490	12,810	12,483	13,005	14,222
Liquor stores	1,936	1,892	1,894	2,089	2,027	2,022
Eating and drinking places	16,038	17,221	18,182	19,538	20,920	22,204
Home furnishings and appliance stores	6,238	6,676	7,280	7,909	8,690	9,405
Farm and garden	2,504	2,545	2,649	2,863	3,223	3,593
Building materials	8,191	9,084	10,265	11,148	12,670	14,332
New car dealers	19,272	21,743	24,256	23,393	25,342	26,538
Automotive group [c]	19,699	20,215	18,058	19,178	20,456	22,063
Other						
Business and personal services	7,981	8,807	9,520	10,628	11,574	12,767
All other outlets	59,296	63,866	66,066	70,990	76,987	83,555

[a] Excludes exempt sales of prescription medicines.
[b] Excludes exempt sales of food for home consumption.
[c] Excludes new car dealers.
[d] Numbers independently rounded.
n.a. Not available.
Source: California Board of Equalization.

TABLE 28

DEMAND AND TIME DEPOSITS, ALL INSURED COMMERCIAL BANKS, CALIFORNIA, 1960–90

(Dollars in millions)

Year[a]	Demand deposits	Time and savings deposits
1960	$12,954	$11,385
1961	14,232	12,851
1962	14,426	14,593
1963	14,939	16,042
1964	15,683	17,983
1965	15,232	20,109
1966	15,671	21,614
1967	17,492	23,762
1968	19,003	26,418
1969	19,989	23,513
1970	20,713	28,636
1971	22,463	33,699
1972	26,607	37,461
1973	28,060	42,789
1974	27,916	51,268
1975	30,682	54,635
1976	32,119	56,775
1977	37,516	63,494
1978	40,897	72,462
1979	44,951	77,008
1980	44,976	92,361
1981	42,675	109,633
1982	40,531	124,743
1983	45,544	133,137
1984	47,962	135,696
1985	54,447	139,015
1986	66,417	140,041
1987	55,652	141,762
1988	59,975	149,439
1989	62,419	165,186
1990[p]	59,539	183,002

[a] As of December call reports, not seasonally adjusted.

[p] Preliminary.

Source: Federal Reserve Bank of San Francisco.

TABLE 29
GROSS LOANS BY MAJOR CATEGORIES, ALL INSURED COMMERCIAL BANKS, CALIFORNIA, 1960–90
(Dollars in millions)

Year [a]	Real estate loans	Commercial and industrial loans	Agricultural loans	Loans to individuals	Other	Total
1960	$5,181	$4,762	$509	$2,648	$1,223	$14,323
1961	5,358	5,122	592	2,769	1,313	15,154
1962	6,153	5,668	636	3,151	1,697	17,305
1963	7,027	6,009	716	3,634	2,376	19,762
1964	7,512	7,081	659	4,208	2,594	22,056
1965	7,974	8,284	748	4,686	2,661	24,353
1966	8,268	9,318	776	4,924	2,665	25,951
1967	8,485	10,112	803	5,126	2,697	27,223
1968	9,230	11,631	823	5,793	3,447	30,924
1969	9,545	12,276	866	6,045	3,706	32,439
1970	9,592	12,965	855	5,903	3,147	32,463
1971	10,871	13,682	990	6,659	4,193	36,395
1972	12,784	15,145	1,255	7,808	6,034	43,027
1973	15,607	18,831	1,559	8,846	7,056	51,899
1974	17,063	21,334	1,584	9,363	7,589	56,934
1975	16,724	20,156	1,614	10,023	7,121	55,637
1976	18,433	19,473	1,860	11,609	8,136	59,511
1977	23,648	21,635	2,019	14,637	8,470	70,409
1978	30,820	25,355	2,292	18,206	9,185	85,858
1979	39,088	30,260	2,655	22,080	8,741	102,824
1980	46,504	33,895	2,848	22,049	8,069	113,365
1981	52,291	39,502	3,345	21,982	11,780	128,900
1982	53,674	46,275	3,763	22,034	15,123	140,876
1983	54,448	48,845	4,136	23,900	18,140	149,469
1984	57,728	49,011	3,935	28,814	14,946	154,434
1985	61,602	49,297	3,377	33,455	16,768	164,499
1986	63,766	53,538	2,685	32,451	16,615	169,055
1987	69,293	50,237	2,475	30,519	13,111	165,635
1988	78,568	50,511	2,679	30,384	13,779	175,921
1989	100,362	51,869	2,636	31,574	15,515	201,956
1990 [p]	124,220	55,497	2,978	32,130	13,601	228,426

Note: Individual figures may not add to totals due to rounding.

[a] As of December call reports except as noted.

[p] Preliminary.

Source: Federal Reserve Bank of San Francisco.

TABLE 30

LOANS AND SAVINGS CAPITAL, CALIFORNIA SAVINGS AND LOAN ASSOCIATIONS,[a] 1960–90

(Dollars in millions)

Year	Mortgage loans closed during the year	End of year mortgage loans outstanding	End of year savings capital	Net new savings during the year [b]
1960	$2,955	$9,141	$8,885	n/a
1961	4,147	11,241	10,778	n/a
1962	5,590	13,941	13,339	n/a
1963	7,691	17,677	16,536	n/a
1964	7,137	20,529	19,300	n/a
1965	5,825	22,176	20,993	n/a
1966	2,953	22,477	21,215	$−610
1967	3,641	23,558	23,469	1,360
1968	3,914	25,154	24,283	−122
1969	3,845	26,780	23,889	−1,395
1970	3,517	28,250	25,040	115
1971	6,576	31,907	30,054	3,776
1972	8,809	37,199	35,660	4,114
1973	7,735	41,113	37,836	476
1974	6,413	43,758	39,359	−349
1975	10,689	49,100	47,147	5,565
1976	17,903	58,553	57,102	7,218
1977	24,888	70,734	66,918	6,480
1978	24,391	80,765	74,896	4,180
1979	25,574	92,512	84,166	4,814
1980	16,074	98,196	89,693	106
1981	10,504	107,866	96,163 [c]	−5,815
1982	14,082	105,927	108,712 [c]	1,281
1983	42,594	132,297	147,857 [c]	29,205
1984	54,120	166,477	188,761 [c]	28,457
1984	56,024 [d]	159,562 [e]	189,788 [c]	28,355
1985	56,444 [d]	173,076 [e]	199,907 [c]	−4,056
1986	84,949 [d]	183,485 [e]	218,132 [c]	6,062
1987	91,422 [d]	203,723 [e]	239,780 [c]	9,824
1988	100,451 [d]	238,317 [e]	258,855 [c]	3,400
1989	81,729 [d]	245,077 [e]	255,006 [c]	−20,202
1990 [p]	74,275 [d]	233,268 [e]	248,497 [c]	−19,326

[a] Insured (SAIF) California savings institutions that are members of the Federal Home Loan Bank of San Francisco.

[b] New savings received less withdrawals excludes interest credited to savings accounts before 1987.

[c] Includes data from branch offices outside of California.

[d] Not comparable to data reported through 1984, due to a change in reporting. When a loan is refinanced at the same institution that held the original loan, the total amount of the refinanced loan is reported. Formerly, only the net amount of additional financing was included.

[e] Not comparable to data reported through 1984 due to a change in reporting. Includes certain government-insured mortgages that were formerly excluded and excludes loans in process that were formerly included.

[p] Preliminary.

Source: Federal Home Loan Bank of San Francisco.

TABLE 31

SELECTED DATA ON FEDERALLY CHARTERED CREDIT UNIONS IN CALIFORNIA, 1960–89 [a]

(Dollars in thousands)

Year [b]	Number of credit unions	Number of members	Total assets	Shares	Total loans outstanding
1960	1014	787,450	$383,723	$340,165	$313,245
1961	1056	852,214	441,302	393,828	347,402
1962	1081	927,654	511,824	453,316	409,969
1963	1106	1,015,808	601,294	533,445	473,297
1964	1128	1,102,380	699,250	618,385	550,150
1965	1142	1,192,932	785,707	693,993	636,454
1966	1185	1,309,746	861,285	753,300	718,046
1967	1209	1,407,640	946,456	834,393	768,772
1968	1225	1,492,051	1,055,097	923,136	883,881
1969	1255	1,585,602	1,191,712	1,034,749	1,024,828
1970	1249	1,181,164	1,360,754	1,181,164	1,109,716
1971	1225	1,746,653	1,626,494	1,436,952	1,267,686
1972	1232	1,871,287	1,928,350	1,715,276	1,471,791
1973	1239	2,045,500	2,272,202	1,987,138	1,758,048
1974	1230	2,282,543	2,737,187	2,367,268	2,106,113
1975	1208	2,445,115	3,403,739	2,994,889	2,498,064
1976	1189	2,683,441	4,185,397	3,668,616	3,150,913
1977	1164	2,995,904	5,374,256	4,613,661	4,119,205
1978	1143	3,421,378	6,374,125	5,408,209	5,110,916
1979	1108	3,682,794	6,616,630	5,737,523	4,994,833
1980	1057	3,968,900	6,950,809	6,286,440	4,410,825
1981	980	4,159,003	6,826,930	6,158,178	4,365,916
1982	906	4,446,793	7,275,638	6,631,732	4,420,910
1983	850	3,975,086	8,684,128	7,999,116	5,202,513
1984	814	3,990,110	10,847,424	9,533,799	6,448,805
1985	790	5,967,495	16,205,219	15,214,141	10,499,988
1986	766	4,307,160	15,211,422	14,011,223	8,889,415
1987 [c]	742	—	17,102,244	15,682,029	10,666,409
1988	712	5,059,752	18,629,617	17,019,032	12,266,802
1989	684	4,883,226	19,615,848	17,858,665	13,459,301

[a] Regulated by the National Credit Union Administration.

[b] As of December 31st.

[c] Due to a change in reporting procedures, State data on the number of members were not available.

Source: California Department of Corporations.

TABLE 32

SELECTED DATA ON STATE CHARTERED CREDIT UNIONS IN CALIFORNIA, 1960–89

(Dollars in thousands)

Year [a]	Number of credit unions	Number of members	Total assets	Shares	Total loans outstanding	Real estate loans outstanding
1960	568	573,548	$304,885	$263,793	$266,374	$41,676
1961	573	630,121	350,725	308,711	296,058	44,724
1962	578	675,287	396,343	343,890	340,125	47,736
1963	582	709,911	448,963	394,587	382,766	44,573
1964	597	788,816	513,302	449,214	437,040	53,971
1965	587	828,389	577,007	496,601	500,689	54,874
1966	623	889,636	639,154	549,351	568,782	64,561
1967	636	955,166	712,321	617,575	613,189	64,600
1968	626	1,006,190	795,758	684,727	696,891	83,837
1969	623	1,077,259	891,033	772,482	788,420	94,154
1970	631	1,139,372	998,764	868,721	858,839	101,161
1971	599	1,182,550	1,152,210	1,004,478	976,271	102,925
1972	590	1,248,463	1,330,711	1,160,215	1,105,569	110,489
1973	596	1,296,105	1,511,003	1,316,539	1,287,143	146,789
1974	591	1,312,193	1,615,949	1,420,664	1,396,985	185,955
1975	587	1,341,288	1,935,507	1,710,369	1,621,089	224,553
1976	576	1,503,437	2,232,994	2,057,351	1,991,402	297,474
1977	556	1,601,603	2,851,789	2,504,181	2,453,162	408,251
1978	534	1,678,279	3,261,776	2,842,131	2,903,915	607,752
1979	493	1,825,160	3,535,214	2,877,833	3,065,665	598,067
1980	478	1,973,513	3,798,533	3,189,679	2,977,642	615,902
1981	450	1,975,104	3,794,317	3,221,836	3,011,722	655,907
1982	417	1,921,032	3,788,929	3,351,392	2,710,921	607,421
1983	397	2,040,746	4,761,669	4,258,249	3,286,588	650,527
1984	376	2,010,832	5,439,894	4,885,542	4,088,618	855,287
1985	360	2,074,771	6,384,522	5,854,804	4,568,946	983,565
1986	345	2,122,970	7,699,129	7,094,187	5,247,434	1,374,204
1987	326	2,137,891	8,108,128	7,439,497	5,801,525	1,844,562
1988	312	2,261,269	8,895,818	8,151,271	6,599,922	2,623,122
1989	275	2,313,126	9,293,977	8,467,293	6,974,235	2,635,802

[a] As of December 31st.

Source: California Department of Corporations. Report of State Chartered Credit Unions.

TABLE 33
SELECTED DATA ON FINANCE COMPANIES IN CALIFORNIA, 1971–89 [a]
(Dollars in thousands)

Year [b]	Number of loans made	Total principal amount of loans made	Consumer loans under $10,000 and commercial loans under $5,000		Consumer loans of $10,000 or more and commercial loans of $5,000 or more
			Secured by personal property	Secured by personal property and real property	
1971	1,170,013	$1,897,472	$1,153,541	$54,150	$689,781
1972	1,210,311	1,973,792	1,268,113	62,418	643,261
1973	1,202,884	2,424,236	1,344,871	90,028	989,337
1974	1,024,276	2,403,516	1,212,864	111,590	1,079,062
1975	883,047	2,234,827	1,114,707	156,257	963,863
1976	995,459	2,756,599	1,287,307	212,665	1,256,627
1977	1,073,690	3,047,796	1,393,534	224,676	1,429,586
1978	1,141,163	3,562,541	1,530,849	189,625	1,842,064
1979	1,097,742	5,265,756	1,408,269	182,030	3,675,457
1980	644,632	3,925,512	857,357	187,819	2,880,336
1981	424,672	4,754,757	532,610	203,507	4,018,640
1982	372,192	4,034,562	556,396	125,110	3,353,056
1983	462,319	5,946,563	790,603	104,839	5,051,121

	Number of loans made	Total principal amount of loans made	Consumer and commercial loans over $5,000		Consumer loans under $5,000
			Secured by personal property	Secured by personal property and/or real property	
1984 [c]	713,094	$9,871,291	$5,403,132	$3,388,735	$1,079,424
1985	939,829	10,772,085	2,749,887	7,319,781	1,253,371
1986	806,792	15,946,053	6,460,085	8,450,462	1,144,000
1987	958,181	26,452,306	8,024,683	17,104,574	1,323,049
1988	968,431	20,582,185	7,021,873	12,268,213	1,292,099
1989	1,515,485	35,833,527	10,458,717	23,743,634	1,631,176

[a] Finance companies are licensed under the Personal Property Brokers Law, the Consumer Finance Lender Law, and/or the Commercial Finance Lenders Law.

[b] Data refers to loans made during each year.

[c] In 1984 the categories for reporting loans changed due to changes in regulations about types of security.

Source: California Department of Corporations, Annual Reports for California Consumer Finance Laws.

TABLE 34

SELECTED DATA ON INDUSTRIAL LOAN COMPANIES IN CALIFORNIA, 1971–89 [a]

(Dollars in thousands)

Year	Total asset [b]	Investment certificates [c]	Consumer loans		Commercial loans		Premium finance agencies	
			Number of loans made [c]	Principal amount of loans made [c]	Number of loans made [c]	Principal amount of loans made [c]	Number of loans made [c]	Principal amount of loans made [c]
1971	$456,632	$307,393	170,330	$328,597 [d]	—	—	75,242	$66,540
1972	523,969	344,209	199,737	381,595 [d]	—	—	78,681	75,623
1973	542,939	381,150	189,278	358,728 [d]	—	—	79,893	80,971
1974	560,343	420,069	179,473	351,119	1,359	$17,987	81,645	86,655
1975	613,119	475,922	166,339	361,887	1,453	20,651	79,804	107,310
1976	687,399	537,212	202,104	428,453	25,467 [e]	106,897	19,057	43,303
1977	772,406	608,832	209,259	451,880	28,277	144,528	14,206	48,853
1978	875,928	678,918	209,884	509,688	30,320	175,828	17,849	63,160
1979	1,007,766	766,963	197,740	549,796	33,894	185,920	18,822	74,328
1980	1,120,406	857,038	155,747	448,205	39,367	231,007	22,521	85,678
1981	1,262,858	963,275	97,141	377,766	4,214 [f]	119,556	29,884	100,693
1982	1,630,687	1,266,241	114,501	513,202	4,020	165,059	22,964	101,072
1983	2,035,330	1,621,750	140,240	609,720	4,421	207,448	26,399	98,180
1984	2,325,240	1,896,856	94,777	558,180	4,612	223,684	21,843	110,495
1985	2,508,680	2,032,165	103,964	562,957	7,347	274,318	28,582	305,328
1986	2,677,784	2,172,610	107,620	651,828	3,046	210,821	29,669	420,856
1987	2,997,975	2,426,423	152,471	935,363	3,353	296,311	91,310	1,010,116
1988	3,624,578	2,972,660	131,188	1,193,194	4,227	456,274	113,773	1,040,359
1989	4,436,825	3,758,376	95,920	1,350,903	8,354	593,054	140,291	938,028

[a] Industrial loan companies are licensed lenders who are exempt from the usury law and who make unsecured and secured loans. This schedule does not include mortgage bankers licensed under the Industrial Loan Law.

[b] As of December 31st. From 1971–1984, total assets include thrift companies, non-thrift companies and premium finance companies. Beginning with 1985, total assets do not include premium finance companies.

[c] Data refers to loans made during each year.

[d] Includes commercial loans.

[e] Insurance premium finance company was reclassified as a thrift.

[f] Loans secured by insurance premiums were removed from non-consumer loans and reclassified.

Source: California Department of Corporation, Annual Reports for California Industrial Loan Law.

TABLE 35

SUMMARY OF STATE TAX COLLECTIONS, 1960–61 TO 1991–92

(Excluding departmental, interest and miscellaneous revenue)

Fiscal year	State tax collections			Taxes per capita [a]			Taxes per $100 of personal income [b]		
	General fund (thousands)	Special funds (thousands)	Total (thousands)	General fund	Special funds	Total	General fund	Special funds	Total
Cash basis									
1960–61	$1,537,347	$656,815	$2,194,162	$96.91	$41.41	$138.32	$3.48	$1.49	$4.96
1961–62	1,645,300	669,267	2,314,567	100.25	40.78	141.03	3.51	1.43	4.94
1962–63	1,791,038	711,185	2,502,223	105.66	41.96	147.62	3.54	1.41	4.95
1963–64	2,057,962	813,937	2,871,900	117.40	46.43	163.83	3.80	1.50	5.31
1964–65	2,161,157	931,958	3,093,115	119.89	51.70	171.59	3.68	1.59	5.27
1965–66	2,398,958	971,625	3,370,582	129.93	52.62	182.55	3.82	1.55	5.37
1966–67	2,422,275	993,277	3,415,552	128.63	52.75	181.38	3.55	1.45	5.00
Accrual basis [c]									
1966–67	2,746,888	1,091,387	3,838,275	145.87	57.96	203.83	4.02	1.60	5.62
1967–68	3,557,610	1,118,311	4,675,921	185.55	58.31	243.86	4.83	1.52	6.35
1968–69	3,962,520	1,210,229	5,172,748	203.94	62.27	266.21	4.90	1.50	6.40
1969–70	4,125,607	1,283,258	5,408,865	208.96	64.98	273.94	4.66	1.45	6.11
1970–71	4,290,263	1,308,350	5,598,613	214.08	65.33	279.41	4.51	1.38	5.89
1971–72	5,212,693	1,385,863	6,598,555	256.22	68.12	324.34	5.17	1.37	6.54
1972–73	5,758,266	1,470,905	7,229,171	279.72	71.46	351.18	5.22	1.33	6.55
1973–74	6,379,476	1,497,588	7,877,064	305.67	71.78	377.45	5.24	1.23	6.47
1974–75	8,045,039	1,529,459	9,574,497	379.95	72.21	452.16	5.91	1.12	7.03
1975–76	9,068,903	1,641,174	10,710,077	421.07	76.19	497.26	6.06	1.09	7.15
1976–77	10,780,867	1,744,013	12,524,880	491.48	79.50	570.98	6.43	1.04	7.47
1977–78	12,951,613	1,874,714	14,826,327	579.46	83.84	663.30	6.92	1.00	7.92
1978–79	14,187,549	2,013,879	16,201,427	621.30	88.15	709.45	6.60	0.94	7.54
1979–80	16,860,019	2,197,397	19,057,417	724.94	94.47	819.41	6.89	0.89	7.78
1980–81	17,808,092	2,191,849	19,999,941	748.86	92.18	841.04	6.45	0.80	7.25
1981–82	19,109,448	2,446,637	21,556,085	787.45	100.83	888.28	6.19	0.79	6.98
1982–83	19,578,803	2,796,214	22,375,017	789.92	112.81	902.73	5.97	0.85	6.82
1983–84	22,308,528	3,376,907	25,685,435	881.47	133.39	1,014.86	6.33	0.96	7.29
1984–85	25,514,709	3,522,886	29,037,595	989.72	136.66	1,126.38	6.56	0.90	7.46
1985–86	26,981,981	3,933,876	30,915,857	1,023.67	149.26	1,172.93	6.38	0.93	7.31
1986–87	31,330,525	4,036,980	35,367,505	1,160.45	149.52	1,309.97	6.91	0.89	7.81
1987–88	31,231,293	4,384,836	35,616,129	1,129.31	158.56	1,287.87	6.36	0.89	7.26
1988–89	35,646,734	4,972,033	40,618,767	1,258.59	175.55	1,434.13	6.65	0.93	7.58
1989–90	37,247,836	5,798,140	43,045,976	1,281.63	199.50	1,481.13	6.43	1.00	7.43
1990–91 [d]	38,917,300	6,850,701	45,768,001	1,303.23	229.42	1,532.65	6.26	1.10	7.36
1991–92 [d]	44,567,000	8,343,391	52,910,391	1,457.63	272.87	1,730.50	6.74	1.26	8.00

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[a] Per Capita computations are based on July 1 populations estimates.

[b] Taxes per $100 personal income computed using calendar year personal income e.g. 1967 income related to 1967–68 tax collections.

[c] Beginning in 1966–67 most state revenues were placed on an accrual basis. Beginning in 1973–74, accounts receivable only are accrued.

[d] Estimated.

Data may not add due to rounding.

Source: California Department of Finance.

TABLE 36
COMPARATIVE YIELD OF STATE TAXES, 1960–61 TO 1991–92
(Dollars in thousands)

Fiscal year	Sales and use	Personal income	Bank and corporation [a]	Tobacco [b]	Inheritance and gift [c]	Insurance [d]	Alcoholic beverages	Horse racing	Motor vehicle fuel [e]	Motor vehicle fees [f]
Cash basis										
1960–61	$711,702	$269,103	$272,718	$66,024	$76,803	$66,745	$50,978	$37,260	$350,801	$264,842
1961–62	749,523	299,034	290,870	66,054	76,012	71,699	55,913	38,311	363,771	274,906
1962–63	813,465	322,012	311,251	70,194	92,432	77,970	58,811	41,663	386,215	298,356
1963–64	876,944	392,341	405,431	71,822	102,195	107,200	61,444	43,442	450,195	329,584
1964–65	939,649	410,109	416,247	74,477	114,464	95,199	66,337	47,560	542,822	353,607
1965–66	1,096,162	454,625	435,597	74,578	123,781	100,854	69,324	47,443	551,108	382,656
1966–67	1,053,249	500,086	453,292	75,597	114,413	107,186	73,315	49,311	548,287	405,061
Accrual basis [g]										
1966–67	1,190,750	626,697	453,292	78,191	141,899	131,226	79,697	49,311	643,698	405,061
1967–68	1,464,927	952,487	576,874	219,272	135,554	121,155	94,896	54,799	581,127	437,918
1968–69	1,652,979	1,101,691	592,303	237,328	158,815	130,312	99,612	59,839	625,667	469,655
1969–70	1,753,611	1,152,053	587,013	236,878	164,299	136,733	105,908	58,244	668,537	498,992
1970–71	1,808,052	1,264,383	532,091	239,721	185,699	158,423	106,556	64,601	674,635	513,202
1971–72	2,015,993	1,785,618	662,522	247,424	220,192	170,179	112,091	69,380	712,426	547,845
1972–73	2,198,523	1,884,058	866,117	253,602	260,119	179,674	114,884	72,693	746,196	596,922
1973–74	2,675,738	1,829,385	1,057,191	258,921	231,934	201,697	119,312	78,289	742,702	644,448
1974–75	3,376,078	2,579,676	1,253,673	261,975	242,627	202,991	120,749	86,637	752,234	664,453
1975–76	3,742,524	3,086,611	1,286,515	268,610	316,648	241,224	125,313	96,117	766,555	749,936
1976–77	4,314,201	3,761,356	1,641,500	269,384	367,964	322,476	127,485	102,702	810,321	807,782
1977–78	5,030,438	4,667,887	2,082,208	273,658	365,092	387,560	132,060	111,591	850,181	924,410
1978–79	5,780,919	4,761,571	2,381,223	268,816	416,955	420,184	140,059	112,856	896,591	1,021,856
1979–80	6,623,521	6,506,015	2,510,039	290,043	465,611	446,228	138,940	127,002	852,752	1,096,640
1980–81	7,131,429	6,628,694	2,730,624	278,161	530,185	460,926	142,860	129,779	839,994	1,127,293
1981–82	7,689,023	7,483,007	2,648,735	276,824	482,300	454,984	139,523	119,626	833,446	1,373,354
1982–83	7,795,488	7,701,099	2,536,011	271,621	517,875	736,929	136,209	120,159	928,633	1,614,993
1983–84	8,797,865	9,290,279	3,231,281	263,231	236,452	457,490	137,433	141,001	1,213,167	1,906,290
1984–85	9,797,564	10,807.706	3,664,593	262,868	296,805	643,139	135,786	133,814	1,159,637	2,137,326
1985–86	10,317,930	11,413,040	3,843,024	258,141	252,810	839,939	132,262	131,592	1,194,172	2,515,295
1986–87	10,904,022	13,924,527	4,800,843	255,076	273,089	1,008,804	131,288	131,733	1,245,881	2,692,835
1987–88	11,650,531	12,950,346	4,776,388	250,572	304,148	1,158,321	128,734	132,208	1,293,254	2,966,334
1988–89	12,650,893	15,886,361	5,138,009	559,616	335,092	1,317,630	128,264	143,379 [h]	1,320,512	3,139,011
1989–90	13,917,812	16,903,654	4,964,842	787,076	388,527	1,167,684	128,523	147,920	1,349,002	3,302,144
1990–91 [ik]	14,366,700	17,626,500	5,395,000	756,300	442,000	1,270,000	127,000	154,102	2,017,839	3,624,480
1991–92 [jk]	16,462,800	19,337,006	5,560,000	802,100	487,000	1,325,000	325,000	157,114	2,536,885	4,729,780

[a] Includes the corporation income tax, and commencing with 1989 data, the unitary election fee.
[b] Proposition 99, of 1988, increased the cigarette tax to $0.35 per pack and added an equivalent tax to other tobacco products.
[c] Proposition 6, of 1982, repealed the inheritance and gift taxes and imposed an estate tax equal to the maximum allowable Federal estate tax credit effective for decedents dying on or after June 8, 1982.
[d] The conclusion of litigation resulted in additional revenue of $51 million in 1987–88, $178 million in 1988–89 and is estimated will result in an additional $13 million in 1990–91.
[e] Motor vehicle fuel tax (gasoline), use fuel tax (diesel) and liquefied petroleum gas.
[f] Registration and weight fees, motor vehicle license fees and other fees.
[g] Beginning in 1966–67 most state revenues were placed on an accrual basis. Beginning with 1973–74, accounts receivable only are accrued.
[h] Beginning with 1988–89, includes revenues from satellite wagering which were not included in prior years.
[i] Includes revenues from Proposition 111 (June 1990) and revenue legislation passed as part of the 1990–91 budget compromise package.
[j] Includes revenues from proposed legislation included as part of the 1991-92 Governor's Budget. These Figures represent the Standard Forecast.
[k] Estimated.
Source: California Department of Finance.

TABLE 37
ASSESSED VALUE OF TANGIBLE PROPERTY, TANGIBLE PROPERTY TAX LEVIES AND AVERAGE TAX RATE IN CALIFORNIA, 1960–61 to 1990–91

Year	Assessed value [b]		Tax levies [a]		Average tax rate	
	Amount (In thousands)	Percent change from preceding year	Amount (In thousands)	Percent change from preceding year	Dollars per $100 assessed value	Percent change from preceding year
1960–61	$29,600,832	7.9	$2,195,588	10.3	$7.42	2.2
1961–62	31,549,630	6.6	2,414,617	10.0	7.65	3.1
1962–63	33,326,914	5.6	2,606,131	7.9	7.82	2.2
1963–64	35,066,088	5.2	2,805,152	7.6	8.00	2.3
1964–65	36,743,364	4.8	3,057,579	9.0	8.32	4.0
1965–66	39,464,013	7.4	3,367,736	10.1	8.53	2.5
1966–67	42,522,365	7.7	3,758,481	11.7	8.84	3.6
1967–68	46,186,881	8.6	4,110,742	9.3	8.90	0.7
1968–69	48,653,400	5.3	4,569,986	11.2	9.39	5.5
1969–70	52,115,409	7.1	4,935,475	8.0	9.92	5.6
1970–71	55,580,735	6.6	5,721,672	15.9	10.86	9.4
1971–72	58,785,243	5.8	6,372,331	11.5	11.43	5.3
1972–73	62,790,656	6.8	6,819,609	7.0	11.44	0.1
1973–74	67,277,649	7.1	6,647,769	−2.5	11.15	−2.5
1974–75	74,298,823	10.4	7,383,411	11.0	11.24	0.8
1975–76	82,691,658	11.3	8,304,125	12.5	11.33	0.8
1976–77	93,716,623	13.3	9,376,391	12.9	11.20	−1.2
1977–78	106,694,452	13.8	10,276,725	9.7	10.68	−4.6
1978–79 [c]	116,736,826	9.4	5,635,715	−45.2	5.37	−49.7
1979–80	132,820,831	13.8	5,661,081	0.4	4.69	−1.5
1980–81	144,739,438	17.9 [d]	6,360,276	12.4	4.63	−1.3
1981–82	657,927,501 [e]	13.6 [e]	7,185,005	13.0	1.144	−1.2
1982–83	737,111,920	12.0	8,007,037	11.4	1.131	−1.1
1983–84	797,370,474	8.2	8,634,771	7.8	1.126	−0.4
1984–85	878,738,713	10.2	9,437,483	9.3	1.113	−1.2
1985–86	968,620,180	10.2	10,274,050	8.9	1.096	−1.5
1986–87	1,058,686,538	9.3	11,125,581	8.3	1.083	−1.2
1987–88	1,165,057,481	10.0	12,203,544	9.7	1.078	−0.5
1988–89	1,275,516,366	9.5	13,307,539	9.0	1.070	−0.7
1989–90	1,412,511,744	10.7	14,720,218	10.6	1.067	−0.3
1990–91	1,577,931,833	11.7	n/a	n/a	n/a	n/a

[a] Excludes reimbursements to local government for homeowners' exemption and business inventory exemption.

[b] Includes the homeowners' exemption ($750 of assessed value from 1969–70 to 1972–73; $1,750 from 1973–74 to 1980–81; and $7,000 beginning in 1981–82). For 1990–91, the homeowners' exemption accounted for $32,540,340,000 of assessed value. The business inventory exemption (15% of assessed value in 1969–70; 30% during 1970–71 to 1972–73; 45% in 1973–74; and 50% from 1974–75 to 1979–80) was also included until 1980–81. Beginning in 1980–81, business inventories became totally exempt and were no longer enrolled.

[c] The revised amount of taxes includes unsecured levies based on the 1977–78 tax rate on secured property. Some counties did not levy at these rates until a 1980 California Supreme Court decision clarified the proper 1978–79 tax rate applicable to unsecured property.

[d] Business inventories became totally exempt effective on the 1980–81 property tax rolls. The 1980–81 percent change from the preceding year was computed by excluding from the 1979–80 assessed value both the taxable and exempt value of business inventories.

[e] The ratio of assessed value to taxable value was changed to 100 percent (from 25 percent) beginning with the lien date for 1981–82. The percent change was computed "after factoring the 1980–81 valuations to 100 percent of value.

n/a Not available.

Source: California State Board of Equalization.

TABLE 38

ALLOCATIONS[a] OF GENERAL PROPERTY TAX LEVIES AS COMPILED FOR COMPUTATION OF THE AVERAGE TAX RATE, BY COUNTY, 1989–90

(Tax allocations in thousands)

County	City	County[b]	School[b]	Other[c] district	Total[c]	Average tax rate per $100 of assessed value[d] 1989–90	Average tax rate per $100 of assessed value[d] 1988–89
Alameda	$153,981	$203,346	$157,963	$151,168	$666,458	1.148%	1.141%
Alpine	—	1,157	371	226	1,754	1.075	1.041
Amador	661	6,608	6,902	366	14,537	1.016	1.020
Butte	4,512	14,149	34,706	9,057	62,424	1.042	1.044
Calaveras	108	5,196	10,321	2,797	18,422	1.066	1.074
Colusa	548	4,391	6,101	984	12,024	1.036	1.042
Contra Costa	55,449	128,890	168,148	161,676	514,163	1.085	1.079
Del Norte	103	1,717	2,928	869	5,617	1.031	1.026
El Dorado	4,017	21,617	25,161	15,122	65,917	1.041	1.052
Fresno	37,473	72,180	95,230	33,286	238,169	1.062	1.065
Glenn	847	3,688	6,116	554	11,205	1.039	1.051
Humboldt	1,982	14,342	17,832	6,086	40,242	1.039	1.041
Imperial	4,100	14,885	22,682	3,637	45,304	1.065	1.048
Inyo	267	6,297	9,031	1,156	16,751	1.008	1.020
Kern	19,607	135,732	148,261	44,048	347,648	1.086	1.071
Kings	2,356	12,519	10,226	3,090	28,191	1.044	1.040
Lake	867	10,480	12,852	4,995	29,194	1.027	1.028
Lassen	389	2,986	5,921	746	10,042	1.063	1.044
Los Angeles	767,525	1,705,793	879,601	735,176	4,088,095	1.063	1.067
Madera	1,515	11,308	22,499	2,678	38,000	1.074	1.080
Marin	21,357	45,695	69,583	25,984	162,619	1.021	1.025
Mariposa	—	2,302	4,208	417	6,927	1.000	1.000
Mendocino	1,052	12,515	16,363	3,200	33,130	1.085	1.092
Merced	4,757	21,819	22,690	5,241	54,507	1.026	1.039
Modoc	189	1,826	2,741	325	5,081	1.035	1.036
Mono	483	5,309	4,742	3,689	14,223	1.067	1.084
Monterey	14,662	40,680	72,379	22,542	150,263	1.020	1.019
Napa	6,777	19,511	30,462	3,761	60,511	1.036	1.041
Nevada	1,324	11,517	19,858	7,925	40,624	1.035	1.037
Orange	182,871	277,057	717,447	326,792	1,504,167	1.080	1.085
Placer	7,278	30,142	49,475	14,898	101,793	1.031	1.039
Plumas	122	4,303	9,469	1,979	15,873	1.043	1.041
Riverside	39,389	136,909	193,748	173,984	544,030	1.095	1.111
Sacramento	43,220	136,446	105,273	99,805	384,744	1.046	1.055
San Benito	674	3,476	8,987	4,235	17,372	1.109	1.096
San Bernardino	53,354	145,322	166,604	189,119	554,399	1.087	1.088

TABLE 38—Continued

ALLOCATIONS [a] OF GENERAL PROPERTY TAX LEVIES AS COMPILED FOR COMPUTATION OF THE AVERAGE TAX RATE, BY COUNTY, 1989–90

(Tax allocations in thousands)

County	City	County [b]	School [b]	Other [c] district	Total [c]	Average tax rate per $100 of assessed value [d]	
						1989–90	1988–89
San Diego	182,371	286,207	583,606	115,796	1,167,980	1.042	1.045
San Francisco	—	428,042	43,183	31,563	502,788	1.090	1.091
San Joaquin	23,254	68,588	52,887	18,721	163,450	1.029	1.030
San Luis Obispo	11,332	48,866	77,998	8,914	147,110	1.062	1.068
San Mateo	57,437	106,525	208,570	52,604	425,136	1.020	1.023
Santa Barbara	11,741	57,613	90,511	32,055	191,920	1.019	1.020
Santa Clara	108,254	250,896	454,414	160,449	974,013	1.088	1.100
Santa Cruz	7,674	28,632	53,546	17,572	107,424	1.016	1.025
Shasta	4,558	15,872	32,451	5,955	58,836	1.055	1.064
Sierra	22	1,765	700	305	2,792	1.002	1.002
Siskiyou	1,359	5,857	8,947	879	17,042	1.025	1.026
Solano	23,175	40,581	33,892	30,867	128,515	1.076	1.099
Sonoma	17,356	66,138	94,180	23,510	201,184	1.056	1.055
Stanislaus	10,886	31,316	80,803	6,168	129,173	1.087	1.097
Sutter	2,276	8,395	11,939	2,424	25,034	1.019	1.027
Tehama	1,096	6,150	8,467	667	16,380	1.031	1.033
Trinity	—	2,003	3,034	314	5,351	1.031	1.029
Tulare	6,912	36,532	36,590	7,802	87,836	1.028	1.029
Tuolume	291	8,967	11,889	1,637	22,784	1.042	1.040
Ventura	29,367	103,789	138,493	96,215	367,864	1.071	1.087
Yolo	13,654	13,997	21,115	6,441	55,207	1.045	1.067
Yuba	959	7,025	7,993	2,002	17,979	1.072	1.079
Total	$1,947,790	$4,895,866	$5,192,089	$2,684,473	$14,720,218	1.067%	1.071%

[a] The county levies at a rate of $1.00 per $100 of assessed value have been allocated among the jurisdictions receiving a portion of those levies. Excluded is the following amount of state reimbursement to local governments: homeowners, $352,208,000.

[b] County levies for school purposes, such as junior college tuition and countywide school levies, are included with school levies.

[c] Includes debt levies on land and/or improvements only. Also includes the portion of the $1.00 levy allocated to jurisdictions previously taxing less than total property, i.e., land only or land and improvements only.

[d] Computed by dividing total levies by the assessed value and multiplying by 100.

Source: California State Board of Equalization.

TABLE 39
CALIFORNIA TRAVEL SPENDING, SELECTED YEARS [a]

(Dollars in millions)

Spending by type of business	1980	1985	1986	1987	1988	1989
Total	$22,470	$31,670	$34,600	$38,460	$44,080	$48,480
Air transport	5,210	5,600	5,840	6,440	7,130	7,840
Travel arrangement	570	1,140	1,230	1,330	1,550	1,710
Destination spending:						
Total	16,690	24,930	27,530	30,690	35,400	38,930
Retail shopping	4,780	7,070	7,790	8,630	9,930	10,920
Restaurants	4,280	6,400	7,050	7,830	9,000	9,880
Lodging	2,780	4,510	5,030	5,760	6,730	7,400
Entertainment	2,030	2,970	3,280	3,640	4,170	4,590
Ground transport	1,470	2,120	2,330	2,590	2,990	3,320
Food stores	1,350	1,860	2,050	2,240	2,580	2,820
Destination spending by type of traveler						
Hotel, motel guests	5,420	9,810	10,820	12,490	14,530	16,120
Day visitors	4,590	6,860	7,570	8,440	9,730	10,700
Private home guests	4,030	5,090	5,590	5,750	6,420	6,940
Vacation home renters	1,530	1,910	2,260	2,520	2,930	3,090
Campers	1,120	1,260	1,290	1,490	1,790	2,080

[a] These estimates supersede those previously released by the California Department of Commerce and Dean Runyan Associates. Differences reflect the addition of a category for vacation home renters, revised data, and changes in methodology.

Source: California Department of Commerce

TABLE 40

MAJOR COLLECTIVE BARGAINING NEGOTIATIONS IN CALIFORNIA, 1991 [a]

Month	Industry	Number of workers
January	All industries	1,700
February	All industries	700
March	All industries	11,190
	Electric, gas and sanitary services	6,200
April	All industries	3,450
May	All industries	33,380
	Wholesale trade	25,000
	Construction - special trade contractors	6,580
June	All industries	50,550
	Construction - special trade contractors	21,150
	Food and kindred products	20,000
	Government	4,300
July	All industries	3,360
August	All industries	8,430
	Apparel and other textile products	4,000
September	All industries	5,500
October	All industries	7,460
	Retail food and liquor stores	3,600
November	All industries	10,000
	Electric equipment and supplies	10,000
	Total	135,720

[a] During the months specified, the individual industries listed have at least 3,000 workers involved in bargaining

Source: California Department of Industrial Relations, Division of Labor Statistics and Research. U.S. Department of Labor, Bureau of Labor Statistics.